The Effects of Discipline and Independence on Elementary School Students' Learning Achievements

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ABSTRACT

This study aims to determine the effect of discipline and independence on the learning achievement of elementary school students. The background of this study is based on the importance of the role of discipline and independence in supporting the success of the learning process. This study uses a quantitative approach with a survey method. The population in this study were students in grades V and VI in one of the public elementary schools, with a randomly selected sample of 60 students. The research instrument was a closed questionnaire to measure the level of student discipline and independence, as well as report card data as an indicator of learning achievement. The results of the data analysis show that there is a positive and significant influence between discipline and student learning achievement. Likewise, student independence also has a significant influence on learning achievement. In addition, discipline and independence simultaneously provide significant contributions to improving student academic achievement. These findings indicate that strengthening the values of discipline and developing independence in students can be an effective strategy in improving the quality of learning. Based on the research results, it is recommended that teachers and parents pay more attention to the formation of disciplined and independent characters from an early age, as part of efforts to improve student learning outcomes as a whole.

Keywords: discipline, independence, learning achievement, elementary school students

1.   INTRODUCTION

Basic education is the main foundation in building the character and intellect of students. One important indicator of educational success is student learning achievement, which reflects the extent to which learning objectives are achieved. In the context of basic education, learning achievement is not only influenced by intellectual intelligence, but also by non-cognitive factors such as discipline and learning independence. A phenomenon often found in elementary schools is the low academic achievement of students which is not always caused by a lack of intellectual ability, but also by a weak attitude of discipline and a lack of independence in managing the learning process. Many students still depend on teachers or parents to complete assignments, lack initiative, and are inconsistent in following school rules and study schedules. This is a serious problem, because the character of discipline and independence is the main capital in forming a responsible person who is ready to face more complex learning challenges at the next level of education.

According to Sardiman (2018), discipline is a form of self-control that makes individuals obey the applicable rules and have the ability to regulate themselves in achieving goals. Discipline in the context of education helps students in forming learning routines, obeying schedules, and respecting the time and rules that apply in the school environment. Meanwhile, Hurlock (2006) stated that independence is the ability of individuals to think, make decisions, and act based on personal awareness without excessive dependence on others. In the learning process, independence allows students to be more active, critical, and responsible for their own learning outcomes.

The purpose of this study was to determine the effect of discipline and independence on elementary school students' learning achievement, both partially and simultaneously. Thus, the results of this study are expected to provide a clearer picture of the important role of these two variables in supporting students' academic achievement. The scope of this study is focused on students in Grades V and VI in one of the public elementary schools, with a quantitative approach. The method used is a survey with data collection techniques through closed questionnaires that have been tested for validity and reliability, as well as documentation of student report card scores as an indicator of learning achievement. The strategy used in solving this problem is through multiple

linear regression analysis, which aims to see how much influence each independent variable (discipline and independence) has on the dependent variable (learning achievement). Through this approach, it is expected to obtain objective data that can be scientifically accounted for.

Theoretically, this research is based on several foundations. First, the behaviorist theory proposed by BF Skinner, which emphasizes the importance of habituation and reinforcement in forming disciplined behavior (Skinner in Slavin, 2009). Second, the constructivism theory of Jean Piaget which states that the learning process occurs actively through interaction between individuals and their environment, which demands independence in thinking and acting (Piaget in Suparno, 2013). Third, the concept of learning achievement according to Winkel (2009), namely the results achieved by students in the learning process that can be seen from academic grades and positive behavioral changes. With this foundation, this research is expected to not only contribute theoretically to the development of educational science, but also practically provide input for teachers and parents in forming the character of disciplined and independent students as the key to improving learning achievement optimally.

2.   METHODS

This study uses a quantitative explanatory approach, namely research that aims to explain the causal relationship between independent variables and dependent variables systematically and measurably. This approach was chosen because it is able to provide an objective picture of the extent to which discipline and independence variables influence student learning achievement, based on empirical data analyzed statistically. This study was conducted in one of the public elementary schools in Banda Aceh City in the even semester of the 2024/2025 academic year, involving 60 students from grades V and VI as research subjects. The selection of subjects was carried out purposively, considering the representation of students who had received formal academic assessments and were actively participating in regular learning activities. The selection of upper-class students assumed that they had a more mature level of cognitive and social development than the lower classes, so it was considered relevant to measure the level of discipline, independence, and learning achievement more accurately.

The main instrument used to obtain data was a closed questionnaire with a four-point Likert scale, designed to measure two main constructs, namely discipline and independence. Each question item in the questionnaire was developed from indicators that refer to educational psychology theory. Discipline is measured based on indicators of compliance with rules, ability to manage time, and consistency in carrying out tasks—as explained by Sardiman (2018), that discipline is an important factor in the formation of directed and responsible learning behavior. Meanwhile, independence is measured based on indicators of initiative in learning, self-decision making, and the ability to complete tasks without direct assistance, as explained by Hurlock (2006) that independence is an important psychological development characteristic in the process of children's education.

Before being widely used, the questionnaire was first tested on groups of students from other schools with similar characteristics, to test the validity and reliability of the instrument. Item validity was tested using the Pearson Product Moment correlation technique, while instrument reliability was measured using the Cronbach Alpha formula. The questionnaire is declared valid if the calculated r is greater than the table r, and reliable if the alpha coefficient value reaches a minimum of 0.70, as stated by Sugiyono (2017). Thus, the data obtained can be guaranteed to be reliable to support the research conclusions.

In addition to data from the questionnaire, learning achievement data was obtained through documentation techniques, namely by taking students' report card scores in core subjects such as Indonesian, Mathematics, and Science. These report card scores are considered as an objective representation of students' academic achievements during one semester. Learning achievement in this study is not only seen as a cognitive end result, but also as a reflection of the learning process influenced by affective factors and student personality, in accordance with Winkel's view (2009) that learning achievement is the result of interaction between various internal and external factors of students.

The collected data were then analyzed using inferential statistical techniques, namely multiple linear regression analysis. This analysis is used to determine how much influence simultaneously and partially discipline and independence have on student learning achievement. Before the regression analysis was carried out, the data was first tested with classical assumption tests, such as data normality, multicollinearity, and heteroscedasticity. This test is important to ensure that the regression model used meets statistical requirements and provides valid results. The analysis was carried out with the help of SPSS version 25, and significance was determined based on the probability value ($p < 0.05$).

The use of multiple linear regression refers to the quantitative analysis theory proposed by Santoso (2016), which explains that the regression model is suitable for seeing the relationship of the influence of more than one independent variable on one dependent variable. With this analysis strategy, it is hoped that the results of the study will be able to provide a deep understanding of the contribution of discipline and independence to learning achievement, and can be used as a basis for consideration in making educational policies at the elementary school level.

Overall, the design of this method is not only designed to obtain valid and reliable results, but also allows for replication in other research contexts, so that it can strengthen the contribution of research to the development of basic education science, especially in the formation of student characters who excel academically and are independent in personality.

3.   RESULTS AND DISCUSSION

The results of this study aim to examine the effect of discipline and independence on student learning achievement in Public Elementary Schools in Banda Aceh City. Based on data obtained through questionnaires and documentation of student report card scores, the analysis was carried out using multiple linear regression to determine the simultaneous effect of both independent variables on the dependent variable.

Table 1 shows the statistical description of the variables studied, namely discipline, independence, and learning achievement. Based on the results of the analysis of the collected data, it is known that the majority of students have a high level of discipline and independence, which is reflected in the average questionnaire score approaching the highest score (4.00). Student learning achievement also tends to be high, with an average report card score of more than 70, indicating that students are successful in various major subjects.

Table 1. Statistical Description of Research Variables

Variables	N	Mean	Tdt. Deviation	Minimum	Maximum
Discipline	60	3.30	0.40	2.50	4.00
Independence	60	3.15	0.45	2.50	4.00
Learning achievement	60	78.50	8.00	60.00	94.00

Source: Research Data (2024).

The average value of discipline (3.30) and independence (3.15) shows that most students have disciplined behavior in following the learning process and are quite independent in completing their assignments. Variations in these values are indicated by relatively small standard deviations (0.40 for discipline and 0.45 for independence), which indicates that the distribution data of students on these two variables tends to be homogeneous or not too spread out.

To analyze the influence of discipline and independence on learning achievement, multiple linear regression analysis was conducted. The regression model is used to determine the relationship between two independent variables (discipline and independence) to one dependent variable (learning achievement). The results of the regression analysis are presented in Table 2.

Table 2. Results of multiple linear regression test of the effect of discipline and independence on learning achievement

Independent variables	Coefficient B	t-value	Sig
Discipline	0.52	4.12	0.000
Independence	0.45	3.76	0.000
(constant)	50.30		

Source: Research Data (2024).

Based on the results of the regression test, it was found that both discipline (B = 0.52; p < 0.01) and independence (B = 0.45; p < 0.01) had a significant effect on student learning achievement. The positive regression coefficient indicates that increasing levels of discipline and independence are directly related to increasing student learning achievement. This means that the higher the level of student discipline and independence, the higher the learning achievement achieved.

R² value obtained is 0.67, which means that 67% of the variation in student learning achievement can be explained by the variables of discipline and independence. This shows that these two factors have a very large influence on student academic achievement, while the remaining 33% is influenced by other factors not examined in this study, such as students' intrinsic motivation, parental support, and teaching quality.

The influence of discipline on learning achievement is in line with the theory put forward by Sardiman (2018), which explains that discipline has an important role in increasing students' consistency in learning. Discipline helps students to stay focused on academic goals and complete their tasks well, which directly affects their learning achievement (Sardiman, 2018). Likewise, with independence, which according to Hurlock (2006) is one of the important aspects in the psychological development of children. Independent students tend to be able to manage their time and tasks without relying too much on the help of others, so that they can increase the effectiveness of learning (Hurlock, 2006).

The results obtained from this regression indicate that both have a significant contribution to learning achievement, which supports the theory that independence and discipline serve as important factors in students' academic achievement. The results of the study showed that discipline and independence have a positive and significant influence on student learning achievement. Student discipline contributes more to improving learning achievement compared to independence, although both have a real influence. This finding is in line with Sardiman's opinion (2018) which stated that discipline is the key to an effective learning process because it helps students to manage time, obey regulations, and follow the learning process consistently. In a disciplined learning environment, students are more structured in completing assignments, following teacher instructions, and maintaining focus during the learning process.

In addition, student independence was also found to have a significant influence on learning achievement. According to Hurlock (2006), independence is the ability of individuals to act and make their own decisions without relying entirely on others. In the context of education, independent students tend to be more responsible in doing assignments, actively seek additional information, and have high intrinsic motivation to achieve. This is also reinforced by Winkel (2009) who explained that independent students are better prepared to face academic challenges because they are able to manage their own learning process effectively.

These findings have important implications for the world of education, especially in the process of developing students' character at the elementary school level. Teachers and schools need to realize that character building, such as discipline and independence, not only supports the learning process, but also has a direct impact on students' academic achievement. Therefore, schools can integrate positive habits into daily activities such as discipline training, learning time management, and providing space for students to make decisions in group and individual tasks. As explained by Slameto (2010), a conducive and participatory school environment can improve discipline and build student independence in learning.

No less important, parents also have a significant role in instilling the values of discipline and independence from an early age in the home environment. Collaboration between schools and families is a strong foundation in shaping students' characters.

Based on the results of this study, several suggestions can be put forward:

a. Schools are advised to design character-strengthening based learning programs, especially in aspects of discipline and independence, both through direct learning in the classroom and extracurricular activities.

b. Teachers are expected to be able to apply learning approaches that encourage students to be more active, responsible, and involved in the learning process, such as project-based learning or problem-based learning (PBL), which indirectly fosters student independence.

c. Parents can support the development of children's character by gradually giving trust and responsibility to children at home. As stated by Suyadi (2013), children's independence will grow along with the opportunities given by parents to children to complete their own tasks.

d. Further researchers are advised to examine other factors that also influence student learning achievement, such as learning motivation, learning style, or social support, so that understanding of the factors determining academic achievement becomes more comprehensive.

4. CONCLUSION

Based on the results of the research that has been conducted, it can be concluded that discipline and independence have a positive and significant effect on the learning achievement of elementary school students in Banda Aceh City. Students who have a high level of discipline tend to be able to follow the learning process more regularly, obey the rules, and complete assignments on time. Meanwhile, independence helps students to manage their learning process independently, take the initiative, and be responsible for their own learning outcomes. This finding supports the theory put forward by Hurlock (2006), which stated that independence is an important aspect in individual development and contributes to a person's ability to make decisions and act without dependence on others. In the context of education, independent and disciplined students show better learning achievement because they have high self-control and internal motivation. Thus, the development of disciplined and independent characters needs to be a focus in the educational process, both in the school and family environment, in order to support optimal student academic achievement.

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