

The Analysis of Relationship Between Green Attitudes and Students' Literacy Ability Toward Environment

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Abstract

This study compared the students' environmental care attitudes and environmental literacy skills in two schools. This study uses an ex-post facto research strategy and a quantitative methodology. Purposive sampling was used to sample the science class population, and data were collected by dividing the environmental care attitude surveys and environmental literacy test instruments. Using an SPSS, the data were examined using the independent sample t-test. The study's findings demonstrate that pupils' environmental literacy for schools X (65.50) and Y (62.09) meet good requirements. The criteria for student attitudes toward the environment are quite good; schools X and Y score 58.56 and 58.86, respectively. The results of the hypothesis test indicate a difference in students' environmental literacy but no difference in their attitude toward the environment between the two schools, with a sig. of $0.020 < 0.05$ for environmental literacy and a sig. of $0.944 > 0.05$ for students' environmental care attitude.

Keywords: Environmental Literacy, Environmental Care Attitude, School, Literacy

Abstrak

Penelitian ini membandingkan sikap peduli lingkungan dan keterampilan literasi lingkungan siswa di dua sekolah. Penelitian ini menggunakan strategi penelitian ex-post facto dan metodologi kuantitatif. Purposive sampling digunakan untuk pengambilan sampel populasi kelas IPA, dan pengumpulan data dilakukan dengan membagi instrumen survei sikap peduli lingkungan dan tes literasi lingkungan. Menggunakan SPSS, data diperiksa menggunakan independent sample t-test. Temuan penelitian menunjukkan bahwa literasi lingkungan siswa untuk sekolah X (65,50) dan Y (62,09) memenuhi persyaratan yang baik. Kriteria sikap siswa terhadap lingkungan cukup baik; sekolah X dan Y masing-masing mendapat skor 58,56 dan 58,86. Hasil uji hipotesis menunjukkan adanya perbedaan literasi lingkungan siswa tetapi tidak ada perbedaan sikap siswa terhadap lingkungan antara kedua sekolah, dengan sig. dari $0,020 < 0,05$ untuk literasi lingkungan dan sig. sebesar $0,944 > 0,05$ untuk sikap peduli lingkungan siswa.

Kata Kunci: Literasi Lingkungan, Sikap Peduli Lingkungan, Sekolah, Literasi

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INTRODUCTION

Indonesia is a country that has extraordinary natural resources because it has a variety of resources, including forests, gas, oil, and coal, which are very large. Concern for the environment is often raised in today's society due to the extensive environmental damage caused by illegal logging, free logging, and unsustainable exploitation of natural resources. According to the Indonesian Environmental Status report issued by the Ministry of Environment in 2007, the level of ecological

damage in Indonesia is already very high, such as due to deforestation, which causes erosion and landslides; air pollution; pollution due to the widespread use of motorized vehicles; and the attitude of residents who always throw garbage out of place. The climate was changing more rapidly, and disasters continued to occur one after another. This is a very mind-blowing incident. Erosion and landslides that hit resulted in many victims, air pollution problems in big cities due to the heavy use of motorized vehicles, the attitude of people who continue to throw garbage in the wrong place, and various other deviations in actions that can reduce environmental quality (Huril et al., 2014).

Environmental interactions and adaptations that occur in human life occasionally show their existence. When humans show their greed to exploit nature, interactions become disrupted from time to time. Degradation of the environment and natural resources in Indonesia, including from coal mining and oil and gas production, has reached extreme levels (Budiaji, 2013). A country's economy, public health, and other living things can be negatively affected by other important environmental problems such as pollution, climate change, loss of the ozone layer, loss of biodiversity, and a number of others. Many visible problems are caused by a person's lack of knowledge about managing the environment or ignorance of the environment. The next reality, according to previous researcher, confirms that the lack of public awareness to preserve the environment can cause problems, one of which is environmental pollution (Dewi & Warno, 2017).

As a result of management issues, the government is dedicated to preserving the environment through educational initiatives. Environmental education is the term most commonly used to refer to special environmental education (PLH). It is hoped that with the growth of environmental awareness, the attitude and behavior toward caring for the environment will also increase and be able to reduce environmental damage. Development initiatives that utilize nature will be influenced by environmental knowledge and attitudes, not only now but also in future generations. Education is a means by which a person can acquire knowledge, attitudes, and behaviors (Landryani, 2014). Everyone should be able to behave well in everyday life by using their knowledge about the environment. This is what is called environmental literacy (Manullang, 2020). Environmental literacy is still considered low due to several factors, including the lack of student interest in studying and studying environmental problems and a lack of caring attitude towards the environment, so environmental literacy among students is still relatively low. Understanding the environment must be the basis of attitudes in order to be able to solve environmental problems, and teachers can act as models and drivers in this regard. Given the importance of environmental literacy skills that everyone must have, it is necessary to know how students' literacy is towards the environment (Manullang, 2020). There are four components that make up environmental literacy: students' environmental knowledge, their cognitive abilities, and their attitudes and behaviors towards the environment. Students still have a low level of environmental literacy for various reasons, one of which is a lack of interest in studying and researching environmental problems (Setyowati, 2014).

The program is part of the government's effort to promote environmental learning, initiated by the Ministry of Environment. Since the Ministry of Environment was still looking for a model for these criteria, the program was first implemented only in Java and only started in 2006. However, since 2007, this initiative has been fully implemented in every province in Indonesia (Tamara, 2018). The aim of this program is for students to demonstrate expertise in their knowledge, attitudes, and skills. Additionally, cultivating an environment in which schools can function as centers of student learning and awareness so that in the future, the school community will take responsibility for efforts to save the environment and sustain sustainable development (Wahyuningtyas et al., 2013).

METHOD

This research uses a quantitative ex-post facto research design. The samples taken were science classes in both schools. Validity and reliability tests were carried out on the items used to measure consistency in this study to see whether the items could be trusted. Several data collection methods will be used in the quantitative descriptive analysis of this study, including tests and questionnaires. To transform data into information that can be understood and used to address problems related to research activities is the definition of data analysis. After the information from the respondents has been collected, it will be examined based on different variables and types of respondents, and calculations will be carried out to provide answers to the problem formulation and test hypotheses. Manual assessment is utilized as an analytical tool to ascertain the degree of environmental literacy attained by pupils using the current answer keys. The analysis technique used for scoring students' environmental care attitudes is the Likert scale. The four alternative answers used in this study are: always (SL), often (SR), sometimes (KD), and never (TP). Researchers used the interval percentage technique to analyze the questionnaire data. Before verifying the hypothesis, it is important to test the requirements, especially homogeneity and normality tests. Using SPSS, researchers conducted the Kolmogorov-Smirnov test as a measure of normality. Researchers used the independent sample t-test because the data obtained is parametric because it is normal and homogeneous.

RESULT AND DISCUSSION

The indicator detects environmental concern, one of the seven environmental literacy indicators with the highest score at school X, based on the results of the student's environmental literacy test. This shows that students are able to recognize environmental problems that occur around them. This school has implemented an understanding of environmental issues and environmental education, which is conveyed in several subjects related to environmental issues. There is organic and inorganic waste management, the construction of infiltration wells, and once a week, activities to clean up the school environment are carried out by all school members. Aspects of environmentally sound school policies, a curriculum based on the environment, participatory school activities within

the PPLH environment, and managing facilities and infrastructure to support environmentally friendly schools are among the criteria for evaluating the school award. School has the lowest average indicator, which is an indication that explains the Environmental Impact Assessment. This shows that there is still a knowledge gap among students about the issues caused by environmental damage.

The environmental literacy of students in school Y obtained the highest indicator score, namely the indicator of identifying environmental problems. This shows that students in school are good at understanding how to deal with problems that exist in the environment. While the lowest indicator is the indicator explaining the EIA (Environmental Impact Analysis). This school has not yet implemented environmental learning programs. Environmental literacy at school X has a higher average score than Y schools. This is because school X have implemented environmental integration in biology and PKWU subjects, involving students in environmental activities held at schools such as making school gardens, maintaining green houses, and reducing plastic waste.

Based on the results of students' environmental care attitudes through questionnaires for school X, the highest average indicator was the indicator of environmental wisdom. The lowest average indicator of students' environmental care attitudes at school X is their attitude towards recycling. This is because students are not used to sorting waste or reusing unused items, and there is a lack of good cooperation for the recycling process so that it becomes a routine activity carried out at school. In order for the program to run according to the principle, which is participatory, where all school members are involved, and sustainable, meaning that activities must be carried out in a planned and sustainable manner, there needs to be cooperation between school members. School Y have the highest average indicator score, namely an indicator of a wise attitude towards the environment. While the lowest average indicator is the attitude towards recycling. This is influenced by the lack of a sense of responsibility to protect the environment and the lack of information regarding the use of recycling. Learning in school Y has not implemented environmental learning, and schools have not implemented rules for students to bring supplies or reduce plastic waste.

The average value of students' environmental care attitudes at the two schools is not much different. School X meet the criteria of "good enough" because they have implemented environmental education through the program as well as several environmental activities that can shape students' attitudes toward caring for the environment. For example, reducing plastic waste is done by managing a healthy canteen, namely by reducing the sale of packaged food. The canteen at the school no longer enforces plastic wrap by accustoming students to bringing food and drink supplies from home to reduce the use of single-use items such as plastic. When students buy drinks in the canteen, sellers provide glasses, or students use their own drinking bottles. The school's environmental consciousness satisfies the "good enough" standard. Although they have not implemented environmental education directly in learning, according to researchers, students can get environmental education from family, peers, books read, watching videos, and the surrounding environment.

The research results were released using an independent sample t-test at both schools. Environmental literacy ability has a sig. (2-tailed) value of 0.020, so H_0 is rejected because $0.020 \leq 0.05$. This shows that there are significant differences between those schools. Both schools have different environmental education curricula, which causes variations in environmental literacy between the two groups of schools. School X has implemented an understanding of the environment through several subjects, namely biology and PKWU (crafts and entrepreneurship). Whereas in school Y, understanding of the environment is only applied through biology subjects. The environmental care attitude of students has a sig. (2-tailed) value of 0.944, which indicates that if $0.944 \geq 0.05$, then H_0 is accepted. This shows that there is no significant difference between those school students in terms of their caring attitude towards the environment.

CONCLUSION

Students at school X possess strong environmental literacy abilities and considerate attitudes about the environment that meet the standards for being fairly good. Students at school Y meet the minimum standards for environmental literacy and caring attitude. Between two schools, there is a substantial difference in the environmental literacy of the children, with a sig. of 0.02. With a value of sig. 0.944, there is no discernible difference between the two schools' perspectives on environmental protection. After implementing the program, schools should be able to properly manage and carry out current programs in accordance with program achievement indicators, ensuring that they are operating at their peak. For schools that have not implemented the program, they should be able to try to implement schools with an environmental culture. pay more attention to research instrument indicators and need a broad reach from several schools so that it is more optimal in comparing these schools.

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