Profile of Students’ Pro-Environmental Attitude: In Adiwyata’s School at Wonosobo

Sylmi Pramiana1,* Endang Wijayanti Laksono2

1 Master of Chemistry Education, Faculty of Mathematics and Natural Sciences, Universitas Negeri Yogyakarta, Indonesia
2 Department of Chemistry, Faculty of Mathematics and Natural Sciences Universitas Negeri Yogyakarta, Indonesia
*Corresponding author. Email: sylmipramia30@gmail.com

ABSTRACT
The environment is the primary concern triggered by the increasing damage to the natural environment. The purpose of this study was to determine the profile of the pro-environmental attitude of students in Adiwyata’s school. This research used a qualitative descriptive approach. The participants were 135 senior high school students in Wonosobo, Jawa Tengah, Indonesia that selected by purposive sampling. The questionnaire consists of 26 items including an indicator of maintaining the cleanliness, throwing garbage in its place, using practicum materials as needed, not scribbling on tables or walls, separating organic and non-organic waste, make energy savings, do not damage existing facilities in the classroom. All questionnaire items were stated valid, and the reliability test using Cronbach Alpha was declared to be acceptable. For technique of data analysis using descriptive quantitative research. The results showed that students with the highest value are indicators of attitude using practicum materials as needed. There is a significant difference in pro-environmental attitudes between students in class XI and XII are higher than class X in all indicators. The teachers should motivate and enhance environmental learning to increase students’ positive pro-environmental attitudes. This finding could be used to predict the students’ pro-environmental attitudes in school.

Keywords: Pro-Environmental attitude, Adiwyata’s school

1. INTRODUCTION

Natural conditions are increasingly showing changes as the times progress. The issue of the environment is one of the main concerns of the international world today. This can be triggered by human behavior which does not care enough about the environment, causing the natural environment to become increasingly warning. The way humans treat the earth and its natural wealth in one lifetime will impoverish our descendants for all time to come [1]. If we want to decrease the degradation of our natural environment, then we have to change our attitudes and our environmental behavior [2]. Environmental awareness is needed to create a healthy environment [3]. Attitude and motivation are essential aspects of the learning process. Success in learning, positive attitudes towards learning, and motivation to learn are interrelated [4]. The more we understand the environmental attitude-mental behavior relationship, the less it guides explaining, predicting, and testing hypotheses about environmental attitudes [5].

The most direct way to keep environmental awareness high is through increasing access to education [6]. Education level has the most substantial effect on environmental awareness. When we talk about pro-environmental attitudes, we mean attitudes that can lead to actions that prevent or reduce harm to the environment or which may even benefit the environment [7]. Improving the pro-environmental attitude of students, however, is an essential but indeed slow process [8]. In Piaget's theory of development [9], can explain the differences we encountered between our two age groups (9-10 and 11-13 years of students) that attitudes can change. Therefore, students’ should be provided with knowledge and understanding of the environment from an early age [10].

Like the mission of the World Environment Day to invite the inhabitants of the earth to interact with nature, recognize, and enjoy the beauty so that the desire to protect moved the earth, the Adiwyata program would much support the realization of the mission [11]. This study will discuss the pro-
environmental attitudes of students of different levels in science class at school Adiwiyata. Adiwiyata is a program of the Ministry of the Environment in collaboration with the Ministry of Education and Culture which aims to encourage and create schools that care for the environment and are environmentally sound and cultured as well as capable of participating in and carrying out efforts to conserve the environment and sustainable development [12]. Concern for the environment is one of the implementations of Law Number 32 of 2009 concerning Environmental Protection and Management, developed through partnerships with educational institutions in schools. The program Adiwiyata can enhance learning and action, thus providing an effective method for improving students’ environmental literacy [9].

Research on pro-environmental attitude in Indonesia, especially in Wonosobo, Jawa Tengah region, is lowly. This is one of the reasons for conducting this research study in school Wonosobo. Adiwiyata’s school is a local program in Indonesia, one of the program to increase pro-environmental attitude a student. The study environment for a student is important because it can minimize the harmful impact for the environment and developing positive pro-environmental attitude. Positive attitudes tend to produce suitable responses, and negative attitudes tend to give wrong responses. The main purpose of this study is to describe students’ pro-environmental attitude in Adiwiyata’s School. According to the explanation above, the statements of the problem are: How students’ pro-environmental attitude in term of seven indicators?

2. RESEARCH METHOD

This research used a qualitative descriptive approach that took place in October 2020 in the 2020/2021 schools’ year. Descriptive research aims to describe, describe or paint systematically, factually and accurately about the facts, the nature of the relationship between the phenomena investigated. The qualitative method is where it is attempted to look for an overview and explanation of problems [13]. The questionnaire was given to 135 science students of X, XI, and XII grade senior high school student in Wonosobo, Jawa Tengah, Indonesia, which selected by purposive sampling.

The senior high school in Wonosobo is a public school. The senior high school in Wonosobo was chosen as the research subject because the school won the award Adiwiyata at the provincial level in 2020. The questionnaire consists of 26 items (14 negative and 12 positives). All questionnaire items were stated valid and the reliability test using Cronbach Alpha with $\alpha = 0.619$ declared to be acceptable. For statistical analysis, positive items on the scale are assigned a numerical value ranging from choice (4) always, (3) often, (2) rarely, (1) never, and negative items define opposite. Thus, the maximum value that can be obtained from pro-environmental attitude is 135. Pro-environmental attitudes indicators are presented in Table 1.

The pro-environmental attitude questionnaire consists of 3 aspects, seven indicators, and 26 items. The first aspect is that the attitude of appreciating cleanliness has two indicators, namely maintaining the cleanliness of the surrounding environment and disposing of garbage in its place. The second aspect is a wise attitude towards the environment, there are three indicators, namely using practicum materials as necessary, not scribbling on tables or walls, and separating organic and non-organic waste. The last aspect is the attitude of responsibility towards the environment; there are two indicators, namely saving energy and not destroying existing facilities in the classroom. For technique of data analysis using descriptive quantitative research.

<table>
<thead>
<tr>
<th>Aspect</th>
<th>Indicator</th>
<th>Items</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appreciate cleanliness</td>
<td>Maintaining the cleanliness</td>
<td>13-Jan</td>
</tr>
<tr>
<td></td>
<td>Throwing garbage in its place</td>
<td>14-16</td>
</tr>
<tr>
<td>Thoughtful attitude</td>
<td>Using practicum materials as needed</td>
<td>17-18</td>
</tr>
<tr>
<td></td>
<td>Not scribbling on tables or walls</td>
<td>19-90</td>
</tr>
<tr>
<td></td>
<td>Separating organic and non-organic waste</td>
<td>20-21</td>
</tr>
<tr>
<td>Attitude of responsibility</td>
<td>Make energy savings</td>
<td>22-25</td>
</tr>
<tr>
<td></td>
<td>Do not damage existing facilities in the classroom</td>
<td>26</td>
</tr>
</tbody>
</table>
3. RESULT AND DISCUSSION

The profile of pro-environmental attitudes between class X, XI, and XII senior high school in Wonosobo by giving a questionnaire of pro-environmental attitudes to each class of science class as many as 135 randomly. The results of the questionnaire score for pro-environmental attitude from 7 indicators can be seen in figure 1. Description, (1) Maintaining the cleanliness, (2) Throwing garbage in its place, (3) Using practicum materials as needed, (4) Not scribbling on tables or walls, (5) Separating organic and non-organic waste (6) Make energy savings, (7) Do not damage existing facilities in the classroom.

Adiwiyata’s is one of the schools that develop 4 (four) program components: (1) environmentally sound policies; (2) environmentally based school curriculum; (3) participatory school-based activities; and (4) management of school supporting facilities and infrastructure that is environmentally friendly. The first component of a principal's policy toward school is Adiwiyata carried out by recognizing self-potential, excellence, creativity, innovation, caring for the environment, creating an ideal environment, and appreciating religious lessons. The second component relates to the application of an environment-based curriculum contained in learning devices. The third component is participatory school-based activities such as class service, and religious activities such as class recitation.

The last component is an environmentally friendly school supporting facilities and infrastructure, including trash cans divided into organic and inorganic waste. Since 2018, a senior high school in Wonosobo has become more active in environmental activities. Various environmental care coaching was carried out by the senior high school in Wonosobo academic community to support the Adiwiyata’s program. One of the programs to support Adiwiyata is to minimize waste in school. This activity began with the declaration, Zero Waste which required the entire academic community to care for the environment together. Adiwiyata teaches every school member to actively protect the environment either around the house or school, from biotic to abiotic [14].

A Senior high school in Wonosobo also has 4 (four) gardeners who work to clean the entire school every day. These activities can support a beautiful, comfortable, and clean environment [15]. Therefore, schools need to get used to a pro-environmental attitude since the beginning of students entering school. Class XI and XII students are already familiar with environmentally friendly activities in school activities so that the value in Graph 1 shows that grades XI and XII are higher than class X IPA. Class X IPA for the 2020/2021 school year is the generation after the corona pandemic so that they have never carried out activities in school. The most visible indicator is disposing of trash in its place. This indicates the need to foster attitudes from the time students enter school. Since the beginning, socialized students about activities that support environmental preservation.

![Figure 1](image1.png)

**Figure 1.** The results of the questionnaire scores on the students' pro-environmental attitude
4. CONCLUSION

Based on the research results, can conclude that students have the highest value as indicators of attitude using practicum materials as needed. There is a significant difference in pro-environmental attitudes between students in class XI and XII are higher than student class X in all indicators.

REFERENCES


