

Dampak Aplikasi Ecolife dalam Pembelajaran Ilmu Sosial untuk Menumbuhkan Siswa Eco Intelligence

The Impact of Ecolife Apps in Social Sciences Learning to Grow Eco Intelligence Students

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ABSTRACT

This research is motivated by technology development in learning, which requires educators to innovate in the media used for learning. One of them is learning Social Sciences. This study aimed to determine the effect of an application-based learning media called the eco life application, which researchers developed to grow the ecological intelligence of students at SMP Negeri 3 Lembang. This study uses a quantitative approach with a quasi-experimental method with a non-equivalent control group design. The data collection technique was carried out using a questionnaire given to the research sample, namely class IX H as the experimental class and I as the control class. The analysis technique in this research is hypothesis testing with a t-test or a different test. The results showed that (1) there were differences in the conditions of ecological intelligence in the experimental class before and after being given treatment using the Ecolife application, (2) there were differences in conditions of ecological intelligence in the control class before and after treatment using Microsoft PowerPoint (3) there were differences in ecological intelligence. Experimental class students using the Ecolife application with ecological intelligence in the control class using Microsoft PowerPoint. (4) there was a significant increase in the condition of the experimental class's ecological intelligence before and after implementing the Ecolife application.

ABSTRAK

Penelitian ini dilatarbelakangi oleh perkembangan teknologi dalam pembelajaran yang menuntut pendidik untuk berinovasi dalam media yang digunakan untuk pembelajaran. Salah satunya dalam pembelajaran Ilmu Sosial. Tujuan penelitian ini adalah untuk mengetahui pengaruh media pembelajaran berbasis aplikasi bernama aplikasi ecolife yang dikembangkan oleh peneliti dalam menumbuhkan kecerdasan ekologi siswa di SMP Negeri 3 Lembang. Penelitian ini menggunakan pendekatan kuantitatif dengan metode kuasiexperimental dengan desain non-equivalent control group design. Teknik pengumpulan data dilakukan dengan menggunakan angket yang diberikan kepada sampel penelitian yaitu kelas IX H sebagai kelas eksperimen dan juga IX I sebagai kelas kontrol. Teknik analisis dalam penelitian ini adalah pengujian hipotesis dengan uji t atau uji beda. Hasil penelitian menunjukkan bahwa (1) terdapat perbedaan kondisi kecerdasan ekologi pada kelas eksperimen sebelum dan sesudah diberikan perlakuan menggunakan aplikasi ecolife (2) terdapat perbedaan kondisi kecerdasan ekologi pada kelas kontrol sebelum dan sesudah perlakuan menggunakan Microsoft Power Point (3) terdapat perbedaan kecerdasan ekologi siswa kelas eksperimen menggunakan aplikasi ecolife dengan kecerdasan ekologis di kelas kontrol menggunakan Microsoft Power Point. (4) terjadi peningkatan yang signifikan pada kondisi kecerdasan ekologi kelas eksperimen antara sebelum dan sesudah penerapan aplikasi ecolife.



Introduction

Learning media is an essential component that must exist in a learning activity. Media is a tool that can channel messages from the sender to the recipient to stimulate students' thoughts, feelings, concerns, and interests so that the learning process occurs (Sardiman 2010). A learning media is required to quickly adapt to the times as a tool that supports the learning process to achieve a learning goal. One of the media widely used in conditions like now is the application of e-learning; by utilizing media or the help of electronic devices, it is hoped that it can increase the effectiveness and efficiency of learning activities. One of the media that is widely used in conditions like now is the e-learning application. Utilizing the media or the help of electronic devices is expected to increase the effectiveness and efficiency of learning activities. According to (Michael 2013) states that e-learning applications are learning structured to use an electronic or computer system to support the learning process. This e-learning application can be operated on computers and

smartphones, which are now and smartphones, which are now mandatory items that every group owns. (Arikunto 2010)

Although the role of learning media is vital in learning activities, many learning media still use old methods or methods in their implementation. (Neolaka 2008) This can occur due to several factors. First, because the human resources themselves are less able to adapt to technological developments, there is no progress in improving the quality of learning media; second, regional factors still make it difficult to get access to technological progress itself, especially in Social Sciences (IPS) subjects, where these subjects are known as subjects with a lot of material or memorization. IPS subject, or what is known as integrated IPS, means that this subject can be integrated with any subject; this makes the social studies subject a requirement for values, making it a value-rich subject. One of them is the value of environmental education. (Howard and Walters 2013) The value of Environmental Education is significant to be taught at the lowest to high school levels because matters related to the environment are directly related to everyday life where the environment is where humans live. Therefore, this value is significant and should be taught and instilled early. The value of Environmental Education is significant to be taught at the lowest to high school levels because matters related to the environment are directly related to everyday life where the environment is where humans live. Therefore, this value is significant and should be taught and instilled early. The value of Environmental Education is significant to be taught at the lowest to high school levels because matters related to the environment are directly related to everyday life where the environment is where humans live. Therefore, this value is significant and should be taught and instilled early. From these problems, the researcher raised the research title "The Impact of Ecolife Apps in Social Sciences Learning to Grow Eco Intelligence Students."

Literature Review

Social Sciences Education Learning

Social Sciences is one of the compulsory subjects in education at the primary and secondary levels in Indonesia. IPS abroad is better known as social studies, social education, social studies education, etc. Wesley: "Social studies are the social sciences simplified for pedagogical purposes." So social studies, according to Wesley, is more directed to simplifying social sciences, which aims at pedagogic abilities. Based on this understanding, social studies is an integrated subject from the social and human sciences so that it can develop the ability to become a good citizen. Social Studies in

schools is a subject that systematically combines disciplines such as anthropology, archeology, economics, geography, history, law, philosophy, political science, psychology, religion, and sociology, as well as the humanities, mathematics, and natural sciences. (Sumantri 2001) Social studies education in schools (elementary and secondary) is the integration of various social and humanities disciplines, as well as basic human activities that are organized, presented scientifically, and pedagogically for educational purposes. IPS education for schools is presented in an integrated manner by integrating several disciplines aimed at educational purposes. With the integration of these various disciplines, students are expected to be able to achieve the goals of education itself.

Social Sciences goals

The objectives of social studies, according to (Supardi 2011) are as follows: First, provide knowledge to make students good citizens, aware as God's creatures, aware of their rights and obligations as citizens of the nation, democratic, and have national pride and responsibility, have an identity and national pride. Second, developing critical thinking and inquiry skills to understand, identify, analyze, and have social skills to participate in solving social problems. Third, practicing independent learning, in addition to practicing building togetherness, through more creative and innovative learning programs. Fourth, intelligence, habits, and social skills must be developed. Fifth, social studies learning can also be expected to train students to live up to excellent and commendable life values, including morals, honesty, justice, etc., so they have noble morals. Sixth, awareness and concern for society and the environment should be developed.

Ecological Intelligence

All living things in the world, as well as humans, have the right to live. For this reason, humans are the perfect creatures because they are endowed with reason, mind, and thoughts and need to respect and view other living things as part of the human community of life. In this case, humans interact with other physical environmental elements and form an ecological system called an ecosystem. Ecology is the science of the interrelationships between living things and their environment. To maintain the ecological system, it is necessary to have a harmonious relationship between humans and their environment so that the balance of the ecosystem is maintained and does not become a problem in the lives of humans and other living things. So, therefore,

Ecological Intelligence is the ability of humans to adapt to the environment in which humans are located. Ecology Intelligence is a human ability to respond to conditions that occur around their environment (Supriatna 2016) suggests that ecological Intelligence is often referred to as ecological literacy (ecological literacy or eco-literate), where this Intelligence is based on cognitive aspects or an understanding of how nature supports the life of all living things. (Howard and Walters 2013) Mentions Ecology Intelligence with the term naturalist intelligence. According to him, naturalist intelligence is the human ability to understand natural phenomena, show ecological awareness, and show human sensitivity to nature. Ecological Intelligence is also based on affective aspects, including emotions or feelings, awareness, and empathy. Ecological Intelligence is complex, supported by intellectual (cognitive), affective (social and emotional), and psychomotor elements.

Learning Tools

The word media is of Latin origin, namely *medius*, which means middle, intermediary, or introduction. Based on Flemming (1987) in (Arsyad 2011) argues that the media is often claimed to be a mediator, namely the cause or senses that intervene in two parties and reconcile them. The term media intermediary shows its function or role, which is to regulate an effective relationship between the two main parties in the learning process. Meanwhile, Gagne and Briggs (1975) in (Arsyad 2011) implicitly say that learning media means the senses that are physically used to provide learning material content, which consists of books, tape recorders, cameras, cassettes, video recorders, films, and television. , slides (framed pictures), photos, graphics, and personal computers. The definition of media generally means components of learning origin or physical facilities that contain instructional material in the student's environment that can stimulate students to learn. In short, the media is a tool for conveying or delivering learning messages. The benefits of learning media, in general and precisely, are as learning aids for teachers and students. The benefits of the learning media itself are:

1. Teaching attracts more students' attention so that it can foster learning motivation.
2. Teaching materials are more explicit in meaning so that students can better understand them and enable students to master teaching objectives well.

3. Learning methods vary, not merely verbal communication through the teacher's oral words; the learning process is not dull, and the teacher does not run out of steam.
4. Students carry out more learning activities because they do not only listen to explanations from the teacher but also other activities carried out such as: observing, doing, demonstrating, and others.

Mobile Application-Based Learning Media *Eco-Friendly Traditional House (Ecolife)*

Environmental conditions at this time have undergone many changes that impact the life of living things on earth, one of which is global warming which can cause climate change in parts of the world. (Gamborg and Larsen 2003);(Safronova, Nezhnikova, and Kolhidov 2017). Climate change has been recorded as a challenge humans must face and immediately recover from. However, people worldwide still need to develop an effective and significant response to climate change successfully. Significant research in the past proves that people prefer not to care about climate change (Mustangin 2017). Human indifference to what is happening in nature has an extraordinary impact; the result is not only climate change but involves several aspects of problems related to the globalized environment, such as melting ice at the north pole, water crisis, pollution, depletion of natural resources, natural disasters, deforestation, water acidification sea, extinction of biodiversity and the problem of the damage that occurs on the surface of the earth (Wibowo 2017). According to (Mursyidto 2014), worsening environmental conditions will undoubtedly affect human life. Meanwhile, human life depends on environmental conditions and where humans live. The environment is part of human life, and humans become one of the components of the environment itself. Thus, humans and the environment are inseparable (Rusdina 2015).

Of the various existing environmental problems, no country in the world has not experienced drastic impacts from climate change and environmental problems. It is undeniable that the increasing risk of natural disasters caused by human factors has a significant impact on the sustainability of life. Even though humans have experienced the real impact, humans need to be made aware of protecting the environment in which they live. According to (Kasa 2019) recent management of the environment has shown increasingly worrying symptoms of degradation. The increasing intensity of natural disasters is predicted to become a severe obstacle in building anticipation for global warming. For this reason, an action plan for anticipating the impacts of climate change

must be realized, not stop at the conceptual level. The severe impact of global warming is also making the environment increasingly worrying. Referring to the research that has been carried out (Kasa 2019), human-conscious action is significant for realizing the concept of anticipating the impact of global warming. Humans must have ecological intelligence in order to be able to organize the emotions, thoughts, and actions that they do when interacting with their environment. The ecological approach can be one of the concepts for solving problems from the occurrence of these environmental problems. Human awareness action is significant for realizing the concept of anticipating the impact of global warming. Humans must have ecological intelligence in order to be able to organize the emotions, thoughts, and actions that they do when interacting with their environment. The ecological approach can be one of the concepts for solving problems from the occurrence of these environmental problems. (Ali 2007)

One alternative solution to the problem that can be done is changing lifestyles to be more ecological by using the concept of green behavior. *Green behavior* is a habit carried out by humans consciously in protecting and maintaining the environment as a manifestation of awareness and a sense of responsibility as natural beings. One of the green behavior applications can be made with the eco-friendly traditional house concept. This concept was originally an environmentally friendly building developed in contemporary housing for sustainable development (Widyarti et al. 2011; Wibowo 2017). This is in line with one of the ways to preserve the earth, namely the Sustainable Development Goals (SDGs) or sustainable development, which has been agreed upon by world leaders, including Indonesia. The aim is to end various problems, including poverty, reduce inequality, and protect the environment. This SDG contains 17 goals and 169 targets expected to be achieved by 2030. By applying the eco-friendly traditional house concept, we have supported SDG point 13 in taking immediate action to combat climate change and reduce its impact. Seeing this urgency, the concept of an eco-friendly traditional house application needs to be applied or instilled from an early age, starting in the home and school environment, so that students are accustomed to making ecological habits that are later expected to impact the surrounding environment positively. (Haryati 2012) One way is to integrate this concept with one of the subjects at school, especially social studies subjects. In this case, the eco-friendly traditional house concept integrates with social studies subjects packaged in a mobile-based application, making it easier for students to practice their learning. Therefore, an eco-friendly traditional house application can also be used as a learning medium at the

school level because this application can instill ecological intelligence in students, which can be instilled through learning social sciences. (Kiswanto 2012) One way is to integrate this concept with one of the subjects at school, especially social studies subjects. (Ramadhani 2022) In this case, the eco-friendly traditional house concept integrates with social studies subjects, packaged in a mobile-based application that makes it easier for students to practice their learning. Therefore, an eco-friendly traditional house application can also be used as a learning medium at the school level because this application can instill ecological intelligence in students, which can be instilled through learning social sciences. One way is to integrate this concept with one of the subjects at school, especially social studies subjects. In this case, the eco-friendly traditional house concept integrates with social studies subjects, packaged in a mobile-based application that makes it easier for students to practice their learning. (Lukman and Ishartiwi 2014) Therefore, an eco-friendly traditional house application can also be used as a learning medium at the school level because this application can instill ecological intelligence in students, which can be instilled through learning social sciences. In this case, the eco-friendly traditional house concept integrates with social studies subjects packaged in a mobile-based application, making it easier for students to practice their learning. (Anggraeni, Sul-ton, and Sulthoni 2019) Therefore, an eco-friendly traditional house application can also be used as a learning medium at the school level because this application can instill ecological intelligence in students, which can be instilled through learning social sciences. In this case, the eco-friendly traditional house concept integrates with social studies subjects packaged in a mobile-based application, making it easier for students to practice their learning. (Latifah, Supriatna, and Hawaari 2020). Therefore, an eco-friendly traditional house application can also be used as a learning medium at the school level because this application can instill ecological intelligence in students, which can be instilled through learning social sciences.

Methods

Location and Research Subjects

This research was conducted at SMP Negeri 3 Lembang, located on Jl. Raya Lembang No. 29, Jayagiri Village, Lembang District, West Bandung Regency, West Java Province. The school was chosen as the research object because it aligns with the school's support.

Research Methods

Based on the background description, problem formulation, and research objectives above, the method used in this research proposal is one of the quantitative methods, namely experimentation. According to (Sugiyono 2013a), *experimental research methods* can be defined as research methods used to look for the effect of specific treatments on other objects under controlled conditions. The primary purpose of the experimental design is to test the impact of treatment on research results, which are also controlled by other factors that may influence these results (Creswell 2014). From these two opinions, it can be defined that the experimental method measures a change that occurs after a specific treatment or manipulation of an object.

Types and Research Design

The research design used by the researchers in this study was a nonequivalent control group design. According to (Sugiyono 2013), The research design is almost the same as the pretest-posttest control group design. In this case, the group or class will be given a pre-test first as the initial stage of the research. Then, during the research, the experimental group will be given treatment using the Ecolife application as a learning medium, and the control class will be given a different media, namely Microsoft PowerPoint. After being given different treatments, the next step is for both classes to be given a post-test to measure the differences between the control and experimental classes. (Hamzah 2021)

Research procedure

In this study, researchers must carry out several stages, namely the preparation stage, the implementation stage, the completion stage, and data processing. In the preparatory stage, the researcher conducted a survey, submitted a permit letter to the school, and consulted with several social studies teachers and the vice principal of the curriculum for SMP Negeri 3 Lembang to get an overview regarding the class that would be the researcher's target. After the preparatory stage, the researcher conducted the implementation stage to collect data. (Farisi, Hamid, and Melvina 2017) This stage is divided into three activities: observation of social studies learning conditions in instilling ecological values in students, giving treatment, and the final measurement of the subject studied. After completing the research, the researcher carried out the last stage, the completion stage. At this stage of completion, an analysis of the data that has been

obtained is carried out to find out whether there are significant changes after being given treatment using application media in social studies learning. In processing and analyzing data, researchers used statistical methods processed through the SPSS version 24 application by calculating a questionnaire distributed to the research sample. In this stage, the researcher also draws conclusions and suggestions from the discussion, determines whether the hypothesis in the research is proven, and makes a report on the research results. At this stage of completion, an analysis of the data that has been obtained is carried out to find out whether there are significant changes after being given treatment using application media in social studies learning. (Trianto 2010) In this stage, the researcher also draws conclusions and suggestions from the discussion, determines whether the hypothesis in the research is proven, and makes a report on the research results. At this stage of completion, an analysis of the data that has been obtained is carried out to find out whether there are significant changes after being given treatment using application media in social studies learning. In this stage, the researcher also draws conclusions and suggestions from the discussion, determines whether the hypothesis in the research is proven, and makes a report on the research results.

Research Instruments

In this study, researchers used a questionnaire as a data collection instrument. According to (Sugiyono 2013a), "a questionnaire or questionnaire is a data collection technique that is carried out by giving a set of written statements to the sample to answer." The questionnaire was used to determine the effect of using the Ecolife application in social studies learning on increasing students' ecological intelligence. The questionnaire instrument in this study was used to obtain assessment data from predetermined research samples, namely students on media that had been determined as research subjects as material to determine the impact of using the media in learning. (Widoyoko 2011)

Discussion & Results

The statistical analysis data results show that the experimental and control classes are typically distributed in the normality test pre-test and post-test. The homogeneity test shows that the variance of the data is homogeneous. Furthermore, it can be seen in the discussion of the results of the study as follows:

- 1) Differences in Ecological Intelligence of Experimental Class Students Before and After Treatment

Based on the data obtained, the researcher found differences in results when before the action was given and after the action was given. The difference in these results can be seen in the following graph:

Comparison Chart of Experimental Class Ecological Intelligence

It can be seen from the graph above that the ecological intelligence of students increases in the three indicators after being given treatment by applying the Ecolife application as social studies learning media. Thus, there is a difference in the increase in students' ecological intelligence after being treated in the experimental class using the eco-life application in social studies learning. This is reinforced by the calculation results of the paired sample test t-test using SPSS v.24 software, which shows the results of differences before and after the treatment is given using the Ecolife application. From this test, the sig value (2-tailed) is $0.000 < 0$.



Source: Researcher (2022)

Using application-based learning media is more practical and makes it easier for students to learn wherever and whenever. Therefore, it can provide enthusiasm for learning, a sense of fun, and student interest in the learning process. This is reinforced by the opinion (Sanjaya 2011) about the benefits of learning media for students, namely to make it easier for students to learn and provide and increase learning variations. In addition, the results of this study align with the results of research conducted by (Y. D. Prasetyo 2015), in which the use of mobile application-based learning media can make learning more interesting so that the values or material being taught are more easily absorbed by students.

2) Differences in Ecological Intelligence of Control Class Students Before and After Treatment

Based on the results of research on the ecological intelligence of students conducted in the control class between before and after giving treatment using Microsoft

PowerPoint media, the results showed a marked difference in the activity of decreasing the ecological intelligence of students. These results can be seen in the following graph:

Control Class Ecological Intelligence Comparison Chart



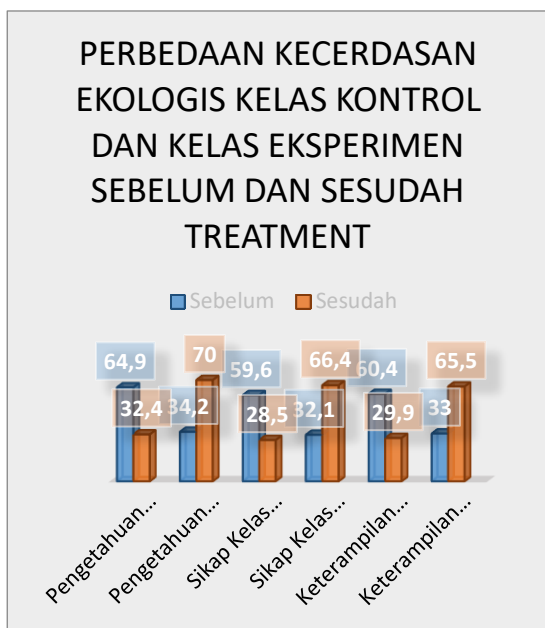
In the graph, it is clear that the ecological intelligence of the control class students has decreased in the three indicators after being given treatment using Microsoft PowerPoint as social studies learning media, and on the knowledge indicator, originally obtained an average of 64.9 before the treatment was given and decreased to 32.4 after the treatment was given. On the initial attitude indicator, an average of 59.6 was obtained. It decreased again to 28.5 after treatment, and on the skills indicator, an average of 60.4 was obtained

Source: Researcher (2022) before treatment and decreased to 29.9 after treatment. With these results, it can be concluded that there are differences in the results before and after being given treatment using Microsoft PowerPoint in the control class as a decrease in students' ecological intelligence. These results are reinforced by the results of the calculation of the paired sample test t-test analysis showing the results of differences in the ecological intelligence of control class students before and after being given treatment using Microsoft PowerPoint as seen from data processing, which shows a sig value (2 tailed) $0.000 < 0.05$ which means meaning that H_0 is rejected. H_a is accepted, so it can be concluded that there are differences in the ecological intelligence of students before and after giving treatment using Microsoft PowerPoint in the control class. This is in contrast to the differences that occurred in the experimental class.

- 3) Comparison Between the Ecological Intelligence of the Experiment Class that is given Treatment Using the Ecolife Application and the Control Class that Uses Microsoft PowerPoint as Social Science Learning Media.

Mobile application-based learning media and Microsoft PowerPoint learning media have different characteristics and effectiveness. (Setia et al., 2017) Along with technology development, learning media based on mobile applications and Microsoft PowerPoint are now starting to be commonly used in education. The results of data analysis through hypothesis testing with the paired sample test technique showed differences in the ecological intelligence of students after and before being treated in the experimental class with the Ecolife application and in the control class using Microsoft PowerPoint. From these results, the sig (2-tailed) value is $0.000 < 0.05$, so H_0 is rejected, and H_1 is accepted. Thus, there are differences in the ecological intelligence of students in the experimental class and control classes. In this case, the difference can be seen in the increase of ecological intelligence in the experimental class and the decrease of indicators of ecological intelligence in the control class. This can be seen in the following graph:

Graph of Ecological Intelligence Comparison of Experiment Class and Control Class



Source: Researcher (2022)

With these results, it can be concluded that mobile application-based learning media is now attracting more students' attention because it is felt to be more effective in terms of time and place because this media can be used by students anytime and anywhere, so it is more practical. In addition, application-based media has more features, including the reminder notification feature. With this feature, students are more enthusiastic and interested in following the instructions on the cellphone screen. This research was to complete a challenge containing ecological habituation, which was packaged as a

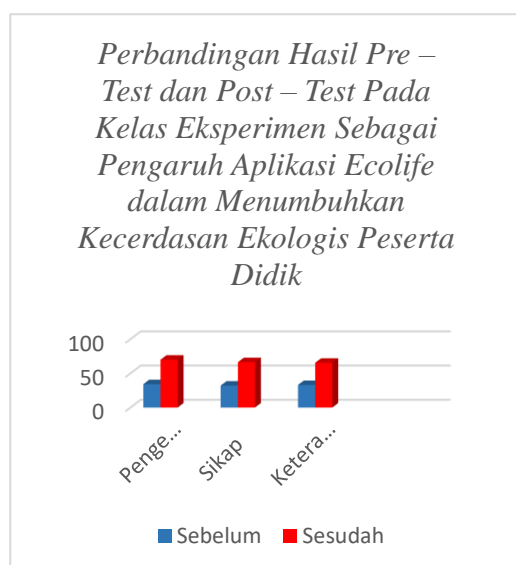
one-day challenge. This is reinforced by the opinion of (Nurrokhmah and Sunarto 2013);(Setyaningsih, Rusijono, and Wahyudi 2020), which states that the use of ICT technology-based learning media, especially mobile-based applications, can increase student enthusiasm or motivate students more in the learning process so that the learning process is more exciting and compelling. This opinion is also in line with the results of research conducted by (Valk, Rashid, and Elder 2010), which shows that the use of application-based learning media can increase the effectiveness and interest of students

during learning so that it can improve student learning outcomes, in this case, the effectiveness of instilling everyday ecological habits. – a day that is packaged in a challenge that students must complete so that, without realizing it, they have gotten used to behaving ecologically. (Budiaji 2013)

4) The Effect of the Ecolife Application as Social Studies Learning Media in Growing the Ecological Intelligence of Experimental Class Students

After processing the data obtained, some testing is done. The eco-life application applied to social studies learning in the experimental class affects growing students' ecological intelligence. This can be seen from the results of changes in several indicators of ecological intelligence, such as knowledge and attitude indicators, which have increased in the experimental class. Researchers have summarized data on pre-test and post-test results or before and after treatment with the eco life application as social studies learning media in the experimental class per indicator to facilitate differences. To clarify, the changes can be seen in the following graph:

Graph of the Effect of Ecolife Applications on the Experimental Class



Source: Researcher (2022)

In the graph, it is clear that there has been a significant increase in the indicators of knowledge, attitudes, and skills. In addition, the results of the hypothesis analysis based on the results of the initial and final measurement questionnaire regarding the effect of the eco life application in cultivating the ecological intelligence of students using statistical tests through the IBM SPSS Statistics 24 software through the paired sample t-test technique show a significance level (Sig) of more than 0.000 smaller than 0.05, which means H₀ is rejected and H_a is

accepted. So, there are differences in the form of an increase

in the initial measurement results and the final measurement of the ecological intelligence of students in the experimental class that applies the eco-life application as a social study learning medium. From the acquisition of these research results, it can be concluded that application-based learning media, especially in this study, the eco-life application, which has been developed by researchers and integrated into the subject matter of the Social Sciences regarding Interregional Dependence in the creative economy sub-chapter, has a

significant influence in growing the ecological intelligence of experimental class students through competency -ecological competence. As (Muhaimin 2015) said, Learning with ecological content is more focused on indicators of knowledge than indicators of attitudes and skills. Therefore, the Ecolife application, as a learning medium, not an application, provides students with knowledge or material and guides them to start instilling straightforward ecological attitudes or habits from the minor things they can do every day through the day one eco challenge feature. In addition, to develop students' skills and critical thinking, The eco life application also provides opportunities for students to be more sensitive to surrounding environmental problems and participate in solving these problems through the eco project feature in which students are asked to analyze common environmental problems and allow them to become problem solvers of problems, by making a product that has ecological value and creative economic value. Thus, students will have a balanced ecological awareness, which can be implemented in everyday life because ecological awareness is critical to solving various environmental problems in the present and future.

Conclusion

Based on the discussion regarding the effect of the eco-life application in learning Social Sciences to foster students' ecological intelligence, the researchers concluded that:

There are differences in the final results of the initial measurement (pre-test) and the results of the final measurement (post-test) regarding the indicators of ecological intelligence of experimental class students before and after giving the action. This can be proven through the analysis of hypothesis testing 1 using the paired sample t-test technique, which produces a significance level of 0.000 and indicates a significance level of less than or less than 0.05.

There are differences in the final results of the initial measurement (pre-test) and the final measurement (post-test) regarding the indicators of ecological intelligence of control class students before and after giving the action. This can be proven through the analysis of hypothesis testing 2 using the paired sample t-test technique, which produces a significance level of 0.000 and indicates a significance level smaller than 0.05.

There is a difference between the ecological intelligence of students in the experimental class who use the Ecolife application and the control class students who use Microsoft PowerPoint. There was an increase in ecological intelligence in the experimental class, while in the control class, there was a significant decrease in ecological intelligence or

competence. This can be proven through the analysis of hypothesis testing 3 using the paired sample t-test technique, which produces a significance level of 0.000 and indicates a significance level that is less than or less than 0.05.

It was concluded that there was a change in the results of the initial measurement (pre-test) and the results of the final measurement (post-test) in the form of an increase in ecological intelligence in the experimental class, which was given treatment using the eco life application in social studies learning. This can be proven through the results of analysis 4 using the paired sample t-test technique, which produces a significance level of 0.000, which is less than 0.05. Thus, it can be concluded that the use of the eco-life application in learning Social Sciences in the experimental class affects the growing ecological intelligence of experimental class students.

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