

Experimentation and Application of Natural Color on Drawing Activities of SBdP Learning Content Based on Local Elementary Culture

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ABSTRACT

The purpose of using materials derived from local wisdom in the form of turmeric, young teak leaves, pandan leaves, and egg whites is as an alternative to dyes. The addition of clear-spray can also strengthen and preserve the color. Meanwhile, the use of ethnography is also very suitable for inculcating culture and improving the quality of education. This type of research is carried out using quantitative research with questionnaires and assessment rubrics as the basis for the assessment. The benefit of this research is to inculcate culture using local wisdom in the form of using natural materials as an alternative to artificial colors in making illustrations. Illustrated images made with the theme of the culture around the community. Learning is carried out according to what has been planned, spiritual attitudes and social attitudes also tend to increase with the stimulus that has been given, while the assessment of knowledge and skills of KKM achievement is 100%.

Keywords: *natural colors, illustrations, local culture.*

1. INTRODUCTION

One way is by ethnography, namely culture-based art learning. How learning is planned, implemented, evaluated, and followed up with a cultural approach so that students not only carry out fun learning, but also develop a culture using learning and local wisdom. The community has the right to organize community-based education in formal and non-formal education in accordance with the peculiarities of religion, social environment, and culture for the benefit of the community. Illustration is an expectation of impossibility and is not much different from wishful thinking, is virtual or virtual. Illustrations work in a variety of verified. (Pratisthita, S. T. 2019) Before ethnography-based learning is carried out, ethnographic research is needed in schools, families, and communities to find out the cultural characteristics and local wisdom possessed. According to Creswell (2012), ethnographic research is a qualitative research strategy in which researchers investigate a cultural group in a natural environment over a long period of time in collecting primary data, observation data, and interview data.

Basically, nature has provided everything that humans need, including the need for dyes. Natural dyes are called natural dyes. Natural dyes are safer to use, because they do not have harmful side effects for students. However, natural dyes have shifted their use, because these dyes are easy to fade and are less bright in color, so the work used becomes less attractive. Therefore, a binding agent is needed so that the color remains durable and is not easily damaged. For this reason, before the coloring process, natural dyes will be mixed with egg whites and after the work is completed it will be refined by spraying clear. Turmeric or turmeric, (*Curcuma longa* Linn. syn. *Curcuma domestica* Val.), is one of the spices and medicinal plants native to Asia. Efficacy or benefits of the turmeric plant either as a complement to cooking spices, herbs/medicines or to maintain health and beauty. But it can also be used as a coloring agent, such as coloring agents in food and in craft dyes. Curcumin (diferuloylmethane) (3–4%) is the active component of turmeric which is responsible for the yellow color, and consists of curcumin I (94%), curcumin II (6%) and curcumin III (0.3%) (Fachry, A. F., Ferila, B., & Farhan, M. 2014). In addition to the yellow color, the red color can also be taken from young teak leaves, while the green color is from pandan leaves. These three types of plants can be easily found around the school.

In a local wisdom is very closely related to local culture. How the local wisdom found in the community will affect the balance of the environment and local culture so that it is not easily mixed by new cultures. The fading of nationalism is caused by internal problems and external impacts in the era of globalization which cannot be avoided and prevented. Strengthening the sense of nationalism can be started by cultivating a sense of love for the area that is the place of birth through the introduction and understanding of various aspects.

Local wisdom can be the identity of a community group because each region has its own local wisdom. Although there are similarities in local wisdom in several areas that are located close to each other. This local wisdom is passed down from generation to generation in every region in Indonesia and in other parts of the world. Local wisdom in Indonesia is something very unique and amazing. This is because Indonesia has thousands of ethnic groups and each ethnic group has its own local wisdom. Even though they are still in the same land, the wisdom contained in the area is very different from one another. Therefore, local wisdom needs to be developed in the world of education so that it is not eroded by changing times.

2. METHODS

The object of the ethnographic research is the Class V students of SDN Melikan Rongkop with a total of 7 students consisting of 5 men and 2 women with the area of residence in one Kalurahan namely Melikan Village, Rongkop District, Gunungkidul Regency, Yogyakarta Province. The research time was carried out for 2 weeks starting from Monday, November 29, 2021 to Sunday, December 12, 2021. The research sites at SDN Melikan Rongkop were the teacher's room, Class V at SDN Melikan Rongkop, the school yard, and the garden behind the school.

At the planning stage, I prepared learning tools for Cultural Arts and Crafts with illustration material, analyzing culture and local wisdom at SDN Meikan Rongkop. Implementation of cycle 1 on Wednesday, December 1, 2021 for 4 hours of lessons starting from 07.00 – 11.00 WIB. While the implementation of cycle 2 on Wednesday, December 8, 2021 for 4 hours of lessons starting from 07.00 – 11.00 WIB. Observations were carried out during learning using a questionnaire to assess the attitudes, knowledge, and skills of students. Based on the questionnaire used in learning, reflection is carried out for further learning capital.

The research variables are how students are creative in combining colors, the use of natural materials as local wisdom, and the resulting illustrations. The data analysis technique is based on quantitative research with values taken from questionnaires and an assessment matrix that has been made in the lesson plan.

3. RESULTS AND DISCUSSION

Learners as complete human beings have self-potential, both as individuals and members of society. This self-potential will be able to develop properly if it is pursued optimally through the educational process. Through this education, students will be directed to become personal figures who have multiple competencies so that they can grow and develop into community members who are able to solve life's problems. In this case, the main key is learning activities in schools. The growth and development of students through learning does not only occur in school which is limited by classroom walls. However, the learning process for students can also occur in the surrounding environment, namely student activities outside the classroom. Learning that is confined in the classroom often creates boredom for students because they feel they are in another world that is not their world.

In the classroom, students feel that their freedom is deprived, their enjoyment is limited, their laughter is fake, their desires are inhibited. As a result, their creativity is limited to efforts to fulfill and comply with the will of the learning system demanded by the school. Students long to return to their environment which has been integrated from an early age in the personal integrity that has long shaped them. Environmental-based learning can bridge students to rediscover their hopes. What is meant by environment-based learning is a learning strategy that utilizes the environment as a learning target, learning resource, and learning tool. This can be used to solve environmental problems and to instill an attitude of loving the environment. This learning will be very effective if applied in elementary schools. This is relevant to the level of intellectual development of elementary school age (7-11 years) which is at the concrete operational stage. Elementary school students tend to like to play and move so they prefer to learn through exploration and investigation outside the classroom. Through environmental learning, student boredom can be minimized and their love for the environment can be

rebuilt. Thus, the activities of the learning process will be more meaningful and can create the enthusiasm of students in learning. With this enthusiasm for learning, pseudo-thinking activities and students' verbalistic understanding of the concepts being studied can be minimized so that optimally students will be able to get a real learning experience. This meaningful learning experience will be felt again by the environment because in the end students will also return to the community where they live. The benefits of successful learning will be felt when what is obtained from learning can be applied and implemented in the reality of life. This is one of the positive sides behind learning with an environmental approach.

In the implementation of learning which is carried out on Wednesday, December 1, 2021 or cycle 1, learning begins with preliminary activities, namely praying and class attendance. Then the students read the learning objectives for today by providing a stimulus about rhymes, storytelling pictures, and blood circulation. In the core activity, I presented a picture telling a story. I explained the manufacturing process starting from the picture telling the story and what was in the picture telling the story. Next, the teacher together with the students divided the class into 2 groups. There is a division of tasks and roles for each student in accordance with the learning style and abilities of each student.

Table 1. Group Division

No	Division 1	Division 2
1	Dimas Aprilian	Erza Dewangga Arkadean Firly
2	Zifara Ramadhani	Arifa Rizky Fathona
3	Lhutfi Eka Pratama	Raditya Wisnu Septyansah
4	Irsyandi Ilham Syaputra	

In learning, students are facilitated by:

1. Student worksheets
2. A3 . paper
3. Stationery such as ruler, dye, pencil, eraser.

Students carry out tasks according to the Student Worksheet while the teacher observes using a questionnaire and an assessment matrix. After finishing making the story telling pictures, each group made a presentation while the other groups responded. After finishing the presentation, the teacher gave a written test in the form of 10 questions that were presented to students. The assessment of spiritual and social attitudes is assessed based on a questionnaire, the value of knowledge (KI-3) is based on the written value of students, while the value of skills (KI-4) is based on how the performance of each student in the learning activities carried out. The following are the results of the assessment carried out by the teacher in cycle 1.

Table 2. Results of Cycle 1

No	Name of Student	KI-3 Value	KI-4 Value	KI-3 Value	KI-4 Value
1	Dimas Aprilian	B	B	68	68
2	Zifara Ramadhani	A	B	67	78
3	Lhutfi Eka Pratama	A	A	80	71
4	Irsyandi Ilham Syaputra	B	B	77	69
5	Arifa Rizky Fathona	B	B	67	67
6	Raditya Wisnu S.	B	A	68	72
7	Erza Dewangga A.F.	B	A	68	78

Based on the results of the implementation of cycle 1 through a questionnaire and an assessment matrix that has been carried out, it shows that the learning carried out has several advantages and disadvantages. The lack of implementation in cycle 1 includes difficulties in cooperation in choosing a theme and frequent debates to determine it. In literacy and numeracy activities, significant improvements are needed so that it is necessary to provide a stimulus that can develop the abilities of students. In the knowledge assessment, 5 out of 7 children

or 71.42% of students did not reach the KKM. As with skills assessment, the number of students who reach the KKM is only 2 only. So there are as many as 71.42% of students who have not completed according to the KKM.

According to Ahamdi (2008: 125) "Remedial teaching is a special form of teaching that functions to heal, correct, or make things better. As it is known that in the teaching and learning process students are expected to achieve the best possible results so that if it turns out that there are students who have not succeeded in accordance with expectations, a teaching process is needed in which they can only complete learning tasks beyond the predetermined learning time. Based on the experience of fast students, so that they do not remain silent after completing their study assignments in class, they are given additional tasks to enrich their knowledge in the main areas of the language that have been studied. To deal with slow children, the teacher provides additional time so that the lesson can be digested properly. To overcome this, remedial teaching is sometimes carried out.

In general, the purpose of remedial teaching is no different from ordinary teaching, namely in order to achieve the learning objectives that have been set. In particular, remedial teaching aims for students who have learning difficulties to achieve the learning achievement expected by the school through a process of improvement. In detail the objectives of remedial teaching according to (Ahmadi and Widodo, 2008: 154).

- 1) So that students can understand themselves, especially their learning achievements, can recognize their weaknesses in studying the subject matter and also their strengths.
- 2) So that students can improve or change the way of learning in a better direction.
- 3) So that students can choose the right learning materials and facilities;
- 4) So that students can develop attitudes and habits that can encourage the achievement of better results;
- 5) So that students can carry out the learning tasks given to them, after they are able to overcome the obstacles that cause learning difficulties, and can develop new attitudes and habits in learning.

Provisions for the implementation of Remedial

- a. Individual tutoring 0 - 20%
- b. Group guidance 20% - 50%
- c. Relearning 50% - 100%

In the implementation of learning which was carried out on Wednesday, December 8, 2021 or cycle 2, there were several changes based on the results of the evaluation in cycle 1. Learning began with preliminary activities, namely praying and class attendance. Then the students were read the learning objectives for today by providing a stimulus about local culture and wisdom, illustrated images, and animal blood circulation. In the core activity, the teacher and students discuss the shortcomings in the previous lesson. Next, the teacher together with the students divided the class into 2 groups. There is a division of tasks and roles for each student in accordance with the learning style and abilities of each student. The exchange of one member of the group is carried out based on observations in cycle 1 learning so that group work is maximized.

Table 3. Group Division

No	Division 1	Division 2
1	Dimas Aprilian	Lhutfi Eka Pratama
2	Zifara Ramadhani	Arifa Rizky Fathona
3	Erza Dewangga Arkadean Firly	Raditya Wisnu Septyansah
4	Irsyandi Ilham Syaputra	

In learning, students are facilitated by:

1. Student worksheets
2. A3 . paper
3. Stationery such as ruler, dye, pencil, eraser.

The addition of a baby milk spoon is used as a follow-up to the problems carried out in cycle 1. The assessment and observation sheets remain the same as in stage 1, where students carry out tasks according to the LKPD while the teacher observes using a questionnaire and an assessment matrix. After completing the

making of the story telling pictures, each group made a presentation while the other groups responded. After finishing the presentation, the teacher gave a written test in the form of 10 questions that were presented to students. The assessment of literacy and numeracy attitudes is assessed based on a questionnaire, the value of knowledge (KI-3) is based on the written value of students, while the value of skills (KI-4) is based on how the performance of each student in the learning activities carried out. The following are the results of the assessment carried out by the teacher in cycle 2.

Table 2. Results of Cycle 1

No	Name of Student	KI-1 Value	KI-2 Value	KI-3 Value	KI-4 Value
1	Dimas Aprilian	B	A	83	84
2	Zifara Ramadhani	A	A	82	83
3	Lhutfi Eka Pratama	A	A	85	81
4	Irsyandi Ilham Syaputra	B	B	79	79
5	Arifa Rizky Fathona	A	A	83	82
6	Raditya Wisnu S.	B	A	80	82
7	Erza Dewangga A.F.	A	A	81	82

Based on the results of the implementation of cycle 2 through a questionnaire and an assessment matrix that has been carried out, it shows that the learning carried out is in accordance with the implementation of the planned learning. In the assessment of knowledge, the achievement of KKM becomes 100%. Similar to skills assessment, the number of students who reach the KKM. So there are as many as 100% of students who complete according to the KKM. Literacy and numeracy activities also tend to increase with the given stimulus.

4. CONCLUSION

In the development of cultural education, a common understanding is needed between the government, educational institutions, educators (teachers, parents), and the community regarding the importance of developing national culture. In learning activities, teachers/educators have the task of designing learning conditions so as to form a learning environment that ensures the realization of culture-based education. In this case, culture-based learning must be integrated, both in school culture, extracurricular activities, as well as daily activities at home and in the community. In cultural development, it is necessary to pay attention to the forms of national culture (understanding of self-introduction, purpose of life, interaction with people around, and decision-making processes). The method of developing cultural education can be done by (a) awareness and habituation processes; (b) learning through experience; and (c) adapting to the culture and rights of students. The formation of national culture requires (a) regulations that form a stretch that maintains the academic integrity of educational institutions; (b) developing the ability of students to think critically in order to become students who are able to interpret various knowledge and information properly and wisely; and (c) the development of an academic evaluation system design (about promotion and graduation) which is able to become an alternative solution for an assessment system that is truly capable of capturing the abilities of students.

The use of materials derived from local wisdom in the form of turmeric, young teak leaves, pandan leaves, and egg whites has proven to be an alternative for dyes. The addition of clear-spray can also strengthen and preserve the color. The use of ethnography is also very suitable for cultural planting and improving the quality of education. It is proven that in the implementation of learning which is carried out on Wednesday, December 1, 2021 or cycle 1, spiritual and social attitudes need a significant increase so that it is necessary to provide stimulus that can develop students' attitude skills. In the knowledge assessment, 5 out of 7 children or 71.42% of students did not reach the KKM. As with skills assessment, the number of students who reach the KKM is only 2 only. So there are as many as 71.42% of students who have not completed according to the KKM. Meanwhile, in the implementation of learning carried out on Wednesday, December 8, 2021 or cycle 2, spiritual attitudes and social attitudes also tend to increase with the stimulus that has been given, while the KKM achievement knowledge assessment becomes 100%. Similar to skills assessment, the number of students

who reach the KKM. So there are as many as 100% of students who complete according to the KKM. Spiritual attitudes and social attitudes also tend to increase with the given stimulus.

The formation of culture starts from the desire to know and do good things in order to create habits, both in the heart, mind, and behavior. In forming a positive culture, students need to know the reasons why do good, feel good things, and do good things. The need for a positive and caring learning environment that is characterized by compassion, full of care, competence of teachers and school staff who inspire and is free from various forms of violence, as well as intensive education.

ACKNOWLEDGMENT

Praise and gratitude I pray to God Almighty, because of His blessings and grace, I was able to complete this scientific paper. The writing of this scientific paper is carried out in order to fulfill one of the requirements for participating in the international seminar and call of paper commemorating the 100th anniversary of Tamaniswa. With the theme of education, culture, and nationalism in a new era..

I realize that without the help and guidance of various parties, it would be quite difficult for me to complete this scientific paper. Therefore I would like to thank:

1. Mr. Drs. H. Pardimin, M.Pd., PhD as Chancellor of the University of Sarjanawiyata Tamansiswa
2. Mr. Edi Echwanto, S.Pd as Principal of SDN Melian Rongkop
3. Teachers and employees of SDN Melikan Rongkop
4. All Postgraduate Students of the Faculty of Education at the Bachelorwiyata Tamansiswa University
5. Last but not least, for myself and the team. Thank you for fighting so far

The author realizes that in writing this scientific paper, there are still shortcomings, for that criticism and constructive suggestions are expected to be able to perfect this scientific paper.

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