

Vegetable Skin As A Medium in Practical Learning of Soft Natural Material Craft Materials At SMP Negeri 5 Padangpanjang

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ABSTRACT

Objective: This study aims to describe the utilization of vegetable skin as a learning medium for soft natural material crafts and its impact on students' skills, creativity, and understanding in class VIII.6 of SMP Negeri 5 Padangpanjang. Vegetable skin was selected as a medium due to its malleability, safety, environmental friendliness, and suitability for soft natural material characteristics. **Method:** The learning implementation was conducted through three stages: planning, implementation, and evaluation. During the implementation stage, students applied the pointillism technique using a soldering iron to create motifs on the vegetable skin surface. This approach aligns with constructivist theory, which emphasizes the importance of direct experience in knowledge construction. **Results:** The results showed that the use of vegetable skin as a learning medium positively impacted students' material processing skills, fostered creativity through exploration of forms and compositions, and strengthened conceptual understanding of soft natural materials. Based on product assessments, all groups achieved good to excellent categories, with the highest average score of 90.33. **Novelty:** Overall, vegetable skin proved to be an effective contextual and engaging learning medium capable of optimally developing students' creative potential.

INTRODUCTION

Education is a process aimed at developing students' potential so that they possess the knowledge, skills, attitudes, and character necessary for social life [1], [2], [3]. In an era of increasingly rapid scientific and technological development, education is no longer solely oriented toward mastering cognitive aspects, but also toward developing 21st-century skills, including critical thinking, creativity, communication, and collaboration. Therefore, the learning process needs to be designed in an active, innovative, and contextual manner so that students can gain meaningful learning experiences [4], [5].

One subject that plays a crucial role in developing students' skills and creativity is Crafts. This subject is designed to provide a hands-on learning experience through activities such as designing, processing, and producing works of art that have both functional and aesthetic value. Crafts learning emphasizes not only the final product but also the learning process, which involves developing students' creative thinking, problem-solving, decision-making, and motor skills [6], [7], [8].

In the Independent Curriculum, craft learning is directed at utilizing resources available in the surrounding environment as media and learning materials. One of the topics studied is crafts made from soft natural materials. This material requires active student involvement in practical activities, requiring learning media that can support the process of exploration, experimentation, and hands-on creation [9], [10], [11].

Learning media plays a crucial role in supporting the success of the learning process. Selecting the right media will help students understand the material more concretely because they can interact directly with the objects being studied. In craft learning, which emphasizes skills, the use of appropriate media is a crucial factor in creating an effective learning experience [12], [13], [14].

One medium that can be utilized in craft learning is vegetable tanned leather. Vegetable tanned leather is leather that has undergone a tanning process using natural plant-derived materials. These characteristics make vegetable tanned leather highly potential for use as a learning medium for soft natural material crafts.

Based on initial observations conducted in class VIII.6 of SMP Negeri 5 Padangpanjang, it was found that some students still had difficulty understanding the material on soft natural material crafts. To address this issue, teachers implemented the use of vegetable skin as a learning medium. This use of media is expected to provide a more concrete learning experience, improve student skills, and encourage creativity through the creation process.

Several previous studies have shown that the use of natural materials can improve the quality of arts and crafts learning. However, research specifically examining the use of vegetable peels as a medium in crafts learning is relatively limited. Therefore, this study was conducted to describe the use of vegetable peels as a medium in crafts learning for soft natural materials at SMP Negeri 5 Padangpanjang.

RESEARCH METHOD

This study used a qualitative approach with descriptive methods. The study was conducted at SMP Negeri 5 Padangpanjang, with the subjects being the Crafts teacher and grade VIII.6 students.

Research data was collected through observation, interviews, and documentation. Observations were conducted to observe the learning process and student activities during practical activities. Interviews were conducted with teachers and students to obtain information regarding the implementation of learning and learning experiences. Documentation was used to supplement the research data. Data analysis was conducted through data reduction, data presentation, and drawing conclusions. Data validity was achieved through source and technique triangulation.

RESULTS AND DISCUSSION

Vegetable bark is a natural material that can be used as a medium for teaching crafts, particularly soft natural materials. Its malleability, environmental friendliness, and aesthetic appeal make it suitable for practical use [15].

The implementation of the use of vegetable tanned leather is carried out through the planning, implementation, and evaluation stages of the lesson. During the implementation stage, students use a pointillism technique with the aid of a soldering iron to create motifs on the surface of the vegetable tanned leather. This activity provides a hands-on learning experience that encourages active student engagement.

The research results show that using vegetable peels as a learning medium improves students' material processing skills, fosters creativity, and strengthens their understanding of soft natural material craft materials. Students demonstrated high enthusiasm during the learning process and were able to produce works of aesthetic value.

Utilization of Vegetable Skin as a Learning Medium for Crafts Craft learning using vegetable skin as a medium in class VIII.6 of SMP Negeri 5 Padangpanjang is carried out through the stages of planning, implementation, and evaluation. In the planning stage, the teacher prepares teaching modules, determines learning objectives, and prepares tools and materials used during practical activities. The selection of vegetable skin as a learning medium is based on its characteristics which are easy to shape, safe for students to use, and suitable for soft natural material craft materials.

During the implementation phase, the teacher explains the characteristics of vegetable tanned leather, the tools used, and the pointillist technique using a soldering iron. Students are then divided into groups to practice creating their artwork. The activity begins with selecting a design, cutting the vegetable tanned leather to the specified size, transferring the design to the leather surface, applying the pointillist technique using a soldering iron, and ending with the finishing step.



Figure 1. Application of Pointillist Technique
Photo: M. Rian Dwi Kurniawan Saputra, 2026

The image above depicts a practical activity that provides students with the opportunity to interact directly with the materials and tools used. During the learning process, the teacher acts as a facilitator, providing direction and guidance to students. This student-centered learning aligns with constructivist theory, which emphasizes that knowledge is constructed through direct experience and active involvement in the learning process.

Based on observations and interviews, the use of vegetable tanned leather made students more engaged in the learning process than those focused solely on theory. Students were able to learn the characteristics of the material firsthand and gain new experience using the pointillist technique with a soldering iron. However, some students

still had difficulty adjusting the dot density and controlling the soldering iron's heat, requiring guidance throughout the process.

The Impact of Using Vegetable Skin on Students' Skills and Creativity

The research results show that using vegetable tanned leather as a learning medium has a positive impact on students' skills. Most students are able to apply basic craft techniques such as cutting, shaping, and decorating the leather surface with pointillist techniques. Through hands-on practice and training, students become more skilled at using tools and understanding the stages of craft creation.

In addition to enhancing skills, the use of vegetable tanned leather also fosters student creativity. Although the teacher provides an initial design, students still have the opportunity to determine design choices, adjust dot density, and develop the visual quality of their work. The differences in results between groups demonstrate the students' ability to express their ideas and creativity through the same medium.



Figure 2. Group 1's work

Photo: M. Rian Dwi Kurniawan Saputra, 2026

The image above demonstrates the students' ability to apply the pointillist technique to vegetable tanned leather. The arrangement of the dots that form the bird and other supporting elements demonstrates the students' ability to organize composition and produce a work with aesthetic value. Although some areas are still uneven, this work demonstrates that the students have grasped the technique taught.



Figure 3. Group 3's work

Photo: M. Rian Dwi Kurniawan Saputra, 2026

The work in the image above displays a floral theme with a balanced composition and relatively neat dot processing. The use of floral and leaf motifs demonstrates the student's ability to utilize the pointillist technique to create easily recognizable shapes that also have decorative value.



Figure 4. Group 5's work

Photo: M. Rian Dwi Kurniawan Saputra, 2026

The image above shows a fauna-themed vegetable tanned leather craft in the form of an octopus created using the pointillist technique with an electric soldering iron. This work displays a dynamic composition through the processing of tentacles that spread in various directions, giving the impression of movement to the object. The application of the pointillist technique is able to produce a visual texture that strengthens the character

of the octopus form. In general, the work demonstrates good mastery of the technique, although there are still some parts with uneven dot density and shape details that need to be emphasized. Nevertheless, the work has met the aspects of creativity, media utilization, and work completion with good categories.

The differences in visual characteristics between the two works indicate that vegetable leather provides students with the opportunity to develop creativity through variations in form, composition, and visual processing. This finding supports the notion that practice-based learning can enhance creativity by providing students with the opportunity to explore ideas and solve problems that arise during the creative process.

Students' Understanding of Soft Natural Material Craft Materials

From a comprehension perspective, the use of vegetable tanning helps students grasp the soft natural material craft material more concretely. Students not only gain knowledge about the material's characteristics through teacher explanations but also experience it firsthand during the practical process. Interviews indicate that students are beginning to understand the function of the tools, the stages of the process, and the pointillist technique used in creating the artwork.

Students' understanding was also evident in their ability to explain the process of creating the work and apply the techniques they had learned. Although levels of understanding varied, most students showed improvement compared to before the practical activities. This demonstrates that using media appropriate to the material's characteristics can help students develop a deeper understanding. Student learning outcomes are shown in the table below :

Table 1. Student Learning Outcomes

No	Group	Mastery of Political Engineering	Composition	Creativity	Neatness	Utilization of Media	Finishing	Total Score/Average
1	Group 1	90	90	91	91	90	90	542/ 90.33
2	Group 2	91	90	91	90	90	90	542/ 90.33
3	Group 3	88	90	90	85	90	88	531/ 88.50
4	Group 4	88	90	90	83	90	85	526/ 87.67
5	Group 5	90	90	90	88	90	85	533/ 88.83
6	Group 6	90	90	90	88	90	88	536/ 89.33

The assessment results showed that all groups obtained good to excellent categories. Group 1 and Group 2 obtained an average score of 90.33, categorized as very good, while the other groups obtained scores in the range of 87.67–89.33, categorized as good. These achievements indicate that the use of vegetable leather as a learning medium can support the success of craft learning, both in terms of skills, creativity, and students' understanding of soft natural material craft materials.

Overall, this research demonstrates that vegetable peels have the potential to be an effective learning medium for craft classes. This medium not only helps students understand the material more concretely, but also provides an engaging learning experience, enhances creative skills, and encourages the development of student creativity through hands-on activities.

CONCLUSION

Fundamental Finding: This medium provides a concrete learning experience and supports the development of skills, creativity, and student understanding of the material. **Implication:** Therefore, vegetable bark can be used as an effective alternative learning medium to support craft learning at the junior high school level. Teachers can utilize vegetable peels as an innovative alternative learning medium. Schools can support the use of natural materials to improve the quality of learning. **Limitation:** Vegetable bark can be used as a medium for craft learning, particularly in soft natural material crafts, at SMP Negeri 5 Padangpanjang. **Future Research:** Further research can expand the use of vegetable peels in different materials and at different educational levels.

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