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## Go Green Products Using Ecoprint Techniques

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### ABSTRACT

The purpose of this community service (PKM) is to help increase the economic value of the community from the sale of Batik Ecoprint, improve public knowledge by processing and to utilize natural resources, and produce environmentally friendly products (go green). This method is in the form of training to make batik works by using natural materials such as leaves that are around residential residents with the subject in Plumbon District, Cirebon Regency with the following stages: 1). Preparation stage. 2). Implementation stage The implementation of the training. 3). Lecture and simulation methods (direct practice). 4). Evaluation stage As an indicator of the success of community service. Implementation The results of the implementation of making motifs using the eco print technique show that: a) Activities can be carried out according to plan, b) Materials that have been planned can be carried out well, c) The results of the work of activity participants become personal property and tote bags can be used in daily activities and even sold d) The success of the activity participants in the skills of making eco print technique motifs with the guidance of mentors and the enthusiasm of the participants from the community element.

## 1. Introduction

Indonesia is blessed with abundant natural resources; thousands and even millions of types of potential resources are still many that have not been used optimally, one of which is leaf waste which is very abundant and abundant in the community environment that has not been utilized. For this reason, Community Service Activities are a form of education by providing experiences to live in the midst of the community outside the campus. Direct Community Service will show a direct link between the world of education and efforts to realize community welfare. One of them is counselling on clean and healthy living behavior, to support clean and healthy living not only can be lifted from the field of science but also can be raised from the field of design, one of them is using sustainable design, one of the sustainable designs in the fashion world is using the eco-printing method. The eco-printing process uses natural materials, starting from the selection of fabrics and the fabric coloring process. In addition, eco printing produces waste that is not harmful to the environment, both solid waste and liquid waste (go green). Ecoprint exploration in Indonesia can still be developed with various types of plants that exist in Indonesian forests. This dedication raises the potential of plants and natural dyes typical of floral. Ecoprint exploration in this service in terms of coloring techniques and processes can be an alternative for textile processing that refers to sustainable design principles. So later, it can be developed into an example of sustainable fashion development and problem-solving from global warming issues (Padgett & Serewiwattana, 2012) and phenomena by utilizing natural ingredients in products in the form of green products (Mohanty et al., 2002).

Referring to the results of research (Chollisni et al., 2022; Nofiani, D. et al., 2021) on the fashion creative economy sector in Indonesia, it shows that several small and medium enterprises have changed the orientation of business processes to become more environmentally friendly (Tjahjadi et al., 2020) – go green. The implementation of PKM regarding eco print itself has begun to bloom in various regions, including (Widiyati et al., 2021) conducting training in DKI Cipayung, East Jakarta. The results of the activity of creating motifs using eco prints on tote bags using eco print techniques can be concluded that: a) Activities can be realized synchronously using a plan, b) Materials that have been planned can be realized properly, c) The work of activity participants can be owned exclusively & tote bags can be used in daily activities and even sold d) The success of activity participants in the skills of creating eco print technique motifs using guidance from a mentor.

PKM eco print is also carried out by (Gunawan & Anugrah, 2020) in Yogyakarta, with the aim of this Service program being to help increase the economic value of the community from the sale of Batik Ecoprint. Education in the community, especially children from the teaching KKN program. Mitra's problem is that residents who are not familiar with eco print batik do not have an idea about packaging and marketing mechanisms. The residents of Japan also have not received education about hamlet mapping, which is actually very useful. Furthermore (Handayani et al., 2021), the theme of eco print with the term natural dyes and associated with the Covid-19 pandemic provides a lesson that it is necessary to design a business that can survive and thrive despite the dynamics of environmental change. However, the Covid-19 pandemic, which lasted for quite a long time, caused several creative industry sectors to fall. To overcome the many creative businesses that have been stopped due to the pandemic, community service activities are aimed at assisting and providing training so that they can be used for business survival. As well as training on the use of digital marketing to reach wider consumers by utilizing Google My Business.

Economic empowerment through eco print training is also carried out by (Setyowati & Wijayanti, 2021) with the aim of overcoming the problems faced by UKM Batik Ecoprint craftsmen in Jember Lor Village, Patrang District, Jember Regency, namely Lack of production equipment and capital to purchase raw fabric materials to meet demand market that is starting to increase. The marketing system is still conventional and has not utilized e-commerce and social media. The method of implementing

the stages are Socialization of community service programs; Preparation of social preconditions, namely strengthening of Ecoprint Batik craftsmen. Implementation of the program by providing production tools in the form of large capacity direct steamers, counseling on e-commerce marketing systems and marketing utilizing social media Facebook and Instagram; and conducting monitoring, evaluation, and reporting.

Furthermore (Andayani et al., 2022) introduced eco prints with the steam technique with training in East Hadimulyo residents. Then the PKM was conducted by (Darmayanti et al., 2021) by socializing that eco print can reduce textile waste which is very disturbing to the community. Meanwhile (Susanto et al., 2021) conducted an introduction and training on eco print techniques for students at SMP N 10 and MTs N 6 Muaro Jambi related to the use of natural materials. This activity aims to increase students' skills related to simple batik techniques that are environmentally friendly and easy to practice by students, namely the eco print technique.

From the explanation of the seven previous literature studies in the form of (state of the art) above, it shows that eco print training has begun to be introduced in various regions with the characteristics of each eco prints, namely: Totebags (Widiyati et al., 2021), natural dyes and digital marketing (Handayani et al., 2021), e-commerce utilization (Setyowati & Wijayanti, 2021), steam technique conducts introduction and training on eco print techniques for students (Susanto et al., 2021), but no one has mentioned going green yet; therefore the novelty of the PKM that we are doing is with the theme of going green with eco print to increase community economic empowerment and product sustainability, especially in the fashion sector.

The problems experienced by the community are 1). They are confused about what way and what to do in order to increase the family's economic income. 2). Do not have skills that can be developed to become a product or service. 3). Not familiar with the go green method with the eco print technique with cheap materials and abundant resources around to be used as a product. Therefore, this PKM aims to provide a solution to the problem, namely eco print assistance, and training.

## **2. Metods**

This Community Service Plan (PKM) is in the form of training to make batik works by utilizing natural materials such as leaves that are around residential areas with subjects in Plumbon District, Cirebon Regency. The activity will be held on 12 September 2021 with a total of 18 participants. The following are the seminars and training conducted:

### **1. Stages of preparation, including:**

- a. Survey
- b. Consolidation and determination of locations and targets
- c. Preparation of training materials/materials, including papers/modules, handbooks, tools, and practice materials for seminars and training activities

### **2. Implementation phase. The implementation of the training will be carried out:**

- a. Previously, there was a presentation of material related to fabric coloring, designing fabric motifs, as well as tips and tricks in coming up with ideas for making types of motifs that would later produce interesting works.
- b. She was followed by direct practice in making motifs with fabric media through the eco print method and an overview of making fabrics using the eco-print method.

### **3. Lecture and simulation methods (direct practice). To carry out community service activities, several training methods are used, namely:**

- a. Lecture Method This method was chosen to provide explanations and explanations to business actors/prospective business actors regarding the materials to be presented.

- b. Question and answer method This method was chosen so that training participants can express their opinions when they have not/have questions regarding the material/training provided
  - c. Simulation method This method is important given to training participants to provide opportunities to practice the training material obtained.
4. Evaluation stage. As an indicator of the success of community service, and evaluation of the achievements will be carried out, namely:
- a. Evaluation during the training process This evaluation covers the involvement and ability of the participants at each stage of the training. In the final stage, participants are expected to be able to take advantage of business applications and be able to create eco-print products.
  - b. Post-training evaluation The success of community service activities will be evaluated based on the level of completion of seminars and training materials, and the service team will evaluate by observing and examining the work.

### **3. Results And Discussion**

#### **3.1 Result**

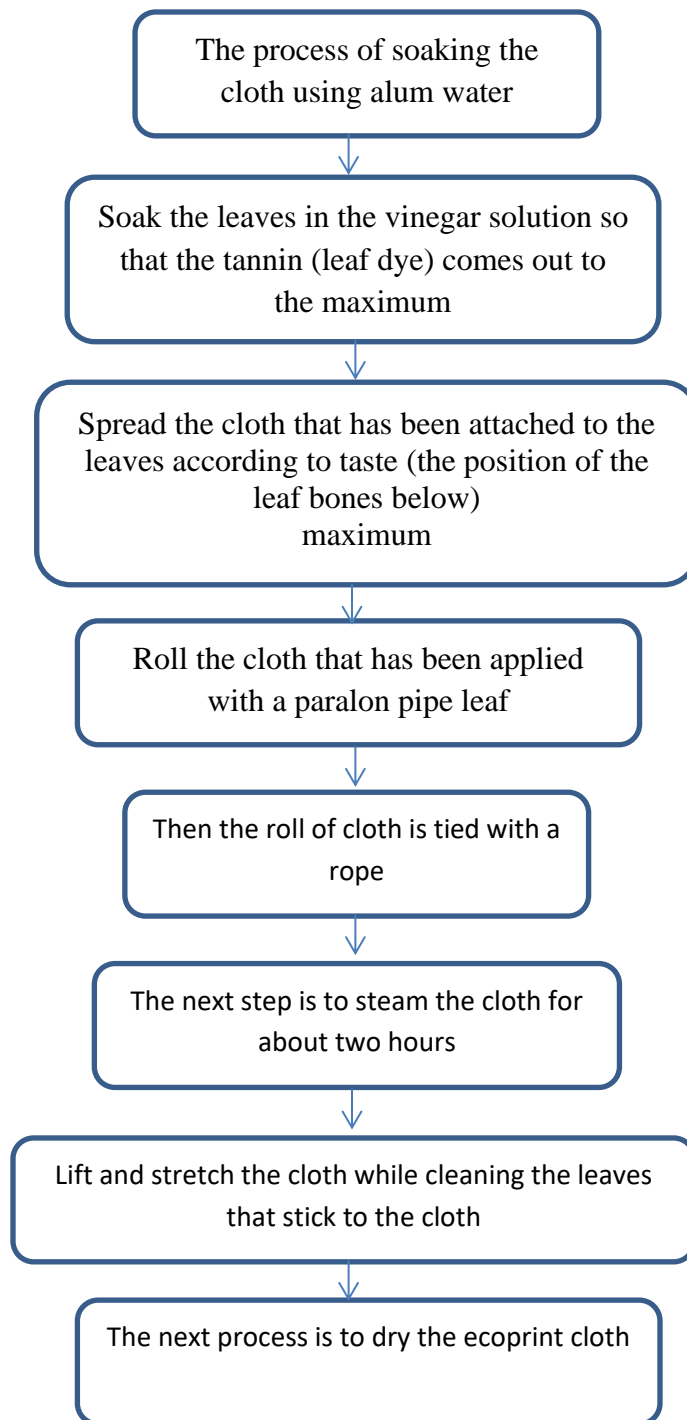
Making an external product in the form of fashion, batik can also be applied in the form of making clothes bags cloth outfits with going green. The material used in this activity is a calico fabric with 100% cotton so that the fabric absorption process can be perfect and produce maximum motifs flora materials (leaves, flower petals, seeds, plant roots, tree trunks). The procedure for implementing the eco print technique is Pounding, Steaming, Leaf Fermentation. The target group in community service is Plumbon District, Cirebon Regency. The purpose of this community service is to provide training and assistance to MSMEs in solving national problems, namely poverty and environmental sustainability: In particular, it is hoped that this program will be able to realize: a) Provide knowledge about the process of making eco prints as a form of creative business by utilizing local potential; c) Provide knowledge about coloring by using plants around us to create the best quality products.

#### **3.2 Discussion**

According to (AlvaniLa, 2019), to make eco prints, you can use two techniques, namely iron blanket, and pounding technique. Iron blanket technique, here are more details:

- 1) Soak the cloth with alum water for about 10 minutes so that the dye will last longer.
- 2) Soak the leaves in the vinegar solution so that the tannins (leaf dyes) come out to the maximum.
- 3) Spread the soaked cloth on the table and attach the leaves according to taste (the position of the leaf bones is below).
- 4) Roll with prison pipe.
- 5) Tie with rope, then boil, and dry.

This is in line with research conducted by (Herlina et al., 2018) by conducting Holistic Village Development and Empowerment Program activities which are expected to increase community skills and be able to form batik SMEs in Brakas to continue to be implemented and developed so that they can become additional livelihoods for the community. around towards an independent economic village. For leaf raw materials, (Khotimah, 2020) stated that the best result was the application of eco printing motifs of sangketan leaves and bitter melon leaves on linen, because the shape and color of the motifs were clearly visible and matched the shape of the original leaf motifs.



**Figure 1.** Ecoprint Production Flow Concept





**Figure 2.** Stages of the Process of Making Eco Print Batik

In closing, below can be seen the various works of motif creation carried out by the training participants:



**Figure 3.** The Result of Eco Print Making From Materials to Products

#### 4. Conclusion

The implementation of community service in Plumbon District, Cirebon Regency, has gone well and smoothly. In detail, these activities can be concluded as follows: 1) The training held is very useful for the trainees, 2) Training provides new insights and knowledge for making eco prints. 3) This training helps solve problems. Lack of skills in processing natural resources

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