



## DEVELOPMENT OF ORNAMENTAL CACTUS HORTICULTURE CULTIVATION FOR VILLAGE YOUTH

Joko Prayudha.S

Universitas Bengkulu

### ARTICLE INFO:

#### **Article history:**

#### **For Example :**

19 November 2020

Received in revised  
form: 25 December  
2020

Accepted:

28 December 2020

Available online:

31 December 2020

#### **Keywords:**

Cultivation,  
Horticulture, Cactus,  
Ornamental Plants

### Abstract

Cultivation is one of the planned activities of maintaining biological resources carried out on an area of land to take advantage or harvest results. The steps taken in this activity are to provide training to young people on how to cultivate horticultural ornamental cactus plants through four stages: 1) Explain the material about an overview of ornamental cactus plants, which includes the definition of ornamental cactus plants and the benefits of cultivating ornamental cactus plants, 2) Planting ornamental cactus plants, treating and controlling pests, 3) Utilizing ornamental cactus plants as economic value, 4) Evaluating the training that has been carried out and drawing conclusions. This activity was carried out with a very good response from the training participants so that they thought this training could be useful in the future. Participants hope that training activities like this can continue with different themes in order to provide education in the development and utilization of existing resources to help from the economic point of view of the local community.

*Copyright © University of Islamic Majapahit Mojokerto, East Java Indonesia*

\* Corresponding author.

*E-mail addresses: [jokoprayuda@gmail.com](mailto:jokoprayuda@gmail.com)*

## 1. Introduction

Ornamental plants are plants that have a certain beauty and attractiveness value. In addition, ornamental plants also have economic value for decoration or aesthetic purposes both indoors and outdoors. Because they contain economic value, ornamental plants can be cultivated to earn income from a promising ornamental plant business. The need for ornamental plants is not a primary need but can be said to be a secondary need, but ornamental plants have become popular in the community. Moreover, the current trend is that there are so many people who are competing to have beautiful ornamental plants to be planted in their yard. These ornamental plants are favored by both the lower class and upper class people with different ownership purposes, for example, some are just for greening or beautifying the house and some are just for prestige.

Many ornamental plant enthusiasts who want beautiful plants ranging from Aglonema plants, Bonsai plants, Hydroponics plants, Tabor flowers and even cactus plants. Besides that, it is also supported by climatic conditions in Indonesia which are very supportive of planting crops, so plant cultivation activities are one of the factors that can be used by the community to fill their spare time during the Covid-19 pandemic or can even be used to earn income from selling these plants. In choosing ornamental plants, consumers will see their appearance, namely the large or small size of the flowers, their color, their uniqueness, their freshness and the quality of these plants so that they can attract consumers' attention to these ornamental plants. So that the correct technique of planting and care for ornamental plants is needed in order to produce good and good quality ornamental plants.

Following the current trend of ornamental plants, the type of plant most favored by the public is the ornamental cactus plant. This type of ornamental plant is the easiest type of plant to grow and maintain. Cactus is an ornamental plant that is very popular because in addition to its very easy maintenance it can also grow well in the lowlands and highlands, to get the quality of cactus plants that are attractive and beautiful to the eye and have high economic value, good and correct cultivation techniques are needed. Cactus is a plant that is very easy to cultivate (Clemson, 2018). So that the cultivation of this cactus plant does not really require large capital to cultivate it. Research on the propagation of various types of cacti has been carried out on many cacti (Serrabo & Da Silva, 2008) and can be used as a reference for cultivating cactus plants in Taba Anyar village. Therefore, cactus plants can be used as plants to beautify the room or house.

Seeing the conditions and opportunities for selling ornamental cactus plants, researchers are interested in conducting training on empowerment of ornamental plant cultivation in the Taba Anyar area as a place to fill spare time in the midst of the Covid-19 pandemic so that participants remain productive while activities from home. So that the provision of material on understanding the cultivation of cactus plants can provide a good understanding and learning in cultivating ornamental cactus plants as economically valuable plants.

## 2. Methods of Implementation

In general, the mechanism model in this activity is to gather participants who want to participate in the development of ornamental cactus plant cultivation. This activity is only limited by a few people, because of the situation of the Covid 19 pandemic which makes it impossible to gather many people. This activity is carried out with a socialization approach and training methods. The socialization approach is a process of how to introduce something to someone (Sutaryo, 2004). Meanwhile, according to Mutiara S Penggabean (2002), the training method is an activity oriented to improve certain skills. This activity includes steps that are carried out by looking at the existing problems in which the participants have not used or maximized agricultural land and their houses for cultivating ornamental plants. The efforts made in this activity are: 1) Presentation of material about the general description of ornamental cactus plants which includes the definition of ornamental cactus, the benefits of ornamental cacti, steps to carry out ornamental cactus planting, 2) The practice of planting ornamental cacti starts from seed preparation, planting media, treatment and control of pests to potting into cactus plants that are ready for sale, 3) Utilization of ornamental cacti as an economic added value, 4) Assessing entrepreneurial opportunities for ornamental cactus plant farmers and 5) Evaluating activities that have been carried out and drawing conclusions in this activity.

## 3. Result and Discussion

Taba Anyar Village is a village where the majority of the population are farmers. It is certain that the people have knowledge in farming. Almost every resident has agricultural land here, but the use of ornamental plants is very minimal here or not even utilized by the community. Given the large potential of farmers in Taba Anyar village in cultivating agriculture, especially ornamental cactus plants, efforts are needed to increase knowledge about the cultivation of ornamental cactus plants. Efforts that can be done are by providing training on how to cultivate ornamental cactus plants through four stages, namely: 1) Presentation of material about an overview of ornamental cactus plants which includes definitions of ornamental cactus plants, the benefits of ornamental cacti and steps to carry out planting of ornamental cactus plants, 2) Doing the practice of planting ornamental cactus plants, care and controlling pests of ornamental cactus plants, 3) Utilizing ornamental plants as an economic added value, 4) Assessing entrepreneurial opportunities for ornamental cactus plant farmers and 5) Evaluating activities that have been carried out and drawing conclusions in activities this. The provision of knowledge and understanding in cultivating ornamental cactus plants will provide provisions for the participants to develop more optimal cultivation of ornamental cactus plants.

This kind of activity really helps people to be creative in planting ornamental cactus plants, especially so that they can get new ways to generate income during the Covid-19 pandemic. In addition, this activity can realize the dreams of the participants to start entrepreneurship in agriculture, especially in the field of ornamental plants (Rahardi, Sriwahyuni and Nurcahyo, 1996). Here are the stages of cactus plant cultivation, namely:

### 1. Preparation of ornamental cactus seeds

Seedlings are the main thing that needs to be prepared before planting. Cactus seeds for planting can be obtained at ornamental plant shops or can be obtained from the parent plant. Choose superior quality seeds without defects, choose cactus plant seeds that have stems that don't

experience bruises and have perfect spines, and also have an upright growth direction. The seeds to be selected should be more than three years old. If the seeds to be planted come from the stem of the parent plant, make sure that the plant is of a suitable age for planting.

## 2. Preparation of ornamental cactus growing media

Decorative cactus plants require dry growing media and also do not hold water, so that the roots of the cactus plant do not bind water too long. So don't use planting media in the form of red soil and clay as a growing medium for cacti, because this type of soil has a very high water-holding capacity, consequently if the amount of water in the planting medium is too much with a very high absorption capacity it will cause ornamental cactus stems to become rotten.

For cactus plant growing media, you should use planting media in the form of sandy soil, compost and husk charcoal mixed into one with a ratio of about 1: 1: 1. After the planting medium is ready, then prepare the pot, the pot to be used must be ensured that it has good drainage so that later the cactus plants do not rot quickly (Dwi Kustiani, 1997). For the size of the planting pot that will be used, adjust it to the size of the cactus to be planted, if the cactus plant is rounded, prepare a pot that has a size of about 5 cm to 10 cm. If the ornamental cactus plants to be planted have a high shape, the planting pot used is a pot that is half the height of the cactus.

## 3. Ornamental cactus care

Even though cactus plants are plants that don't really like water, cactus plants still need to be watered. The watering process is carried out once a week or it can also be adjusted to the level of dryness of the cactus growing media. Around 2 weeks of age, cactus plants can be moved to the appropriate place. Another treatment process besides watering is the replacement of planting pots and planting media which is also done at least once a year.

For the placement, adjust it according to the type because there are those who like sunlight and some like dark places. However, for cactus plants that like sunshine after the planting process, don't put them directly in the sun, but do the placement under the sun after the cactus plants are 3 weeks old after planting. For cactus plants that like dark places, it needs to be moved occasionally to a bright place. In addition to the watering process, changing pots and planting media as well as placement, do the cactus pruning process if it feels very long. This is done so that plants are protected from pests, for example ground snails, mites and fungi. However, if the pest has been attacked, it is necessary to handle it by spraying pesticides.

In addition, according to the training participants for the development of ornamental cactus plant cultivation, they felt that the knowledge gained during the activity was very beneficial for the development of self-awareness of the cultivation of ornamental cactus plants. The discussion and question and answer model that was carried out also provided a very clear and easily accepted understanding of this activity. From the results of interviews with participants, it was found that they were very happy with this pattern of activities. The knowledge they can directly put into practice in real life so that the absorption of knowledge is very useful. Their hope is that this kind of activity may continue to be carried out so that it can provide opportunities for them to learn something new.



Figure 1. Preparation for planting ornamental cactus plants.



Figure 2. Participants start planting ornamental cactus plants.

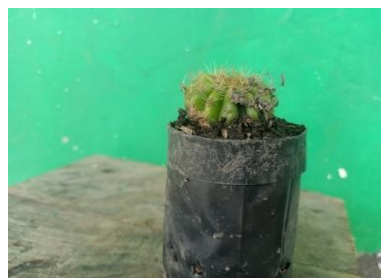


Figure 3. The planted cactus.



Figure 4. Some cactus plants that have been planted and stored in the shade.



Figure 5. Cactus plants that are 1 month old.



Figure 6. Cactus plants that are ready for sale.

#### 4. Conclusion

The activity to develop ornamental cactus cultivation which takes place in Taba Anyar village is an activity that aims to encourage public interest in taking advantage of free time during the Covid-19 pandemic amidst the trend of ornamental plants so that they can use it as a pattern of earning additional money in the midst of this increasingly stagnant economy. With this kind of activity, it is hoped that the participants of the activity will be able to practice and implement the knowledge gained so that the hope is that they will be seriously developed in cultivating ornamental cactus plants as a promising entrepreneurial opportunity. It takes a good cooperation between the parties who take shelter so that empowerment programs like this can be sustainable in the future.

Another recommendation is a follow-up to this activity in the future, so that if there is a similar activity it can be directed directly to the people who need it. The results of the evaluation in this activity explained that the participants felt happy and grateful for being given knowledge about how to develop ornamental cactus plant cultivation and they really hope that there will be similar activities in the future even with different themes. It is hoped that the participants will continue to practice the knowledge they have gained so that it can be useful for themselves, others and the region.

## References

- Blue, F. 2014. Makalah Prakarya Budidaya Tanaman Hias. <http://blogsimpleuntukpelajar.blogspot.co.id> diakses 27 November 2020.
- Clemson. 2018. *Home and Garden Information Center*. <http://www.clemson.edu/Extension/hgic> diakses tanggal 27 November 2020.
- Dwi Kustiani. 1997. *Analisis Usaba Tanaman Hias Dalam Pot (Potplant)*. Jurusan Agribisnis, Fakultas Pertanian Universitas Muhammadiyah malang.
- Hariyadi, S. 2019. *Budidaya Tanaman Kaktus*. <https://cybex.pertanian.go.id/mobile/artikel/84988/BUDIDAYA-TANAMAN-KAKTUS/> diakses tanggal 27 November 2020.
- Penggabean, Mutiara S. 2004. *Manajemen Sumber Daya Manusia*. Jakarta: Ghalia Indonesia.
- Rahadi, F, Sriwahyuni dan Nurcahyo, Eko. 1996. *Agribisnis Tanaman Hias*. Jakarta: Penebar Swadaya.
- Sutaryo. 2004. *Dasar-Dasar Sosialisasi*. Jakarta: Rajawali Press.