

Farmers Behavior on Market Product of Magelang (Duck to Induce Creative Economy in Ngadirojo Village, Secang District

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Abstract

Magelang ducks are one of Magelang's native germplasm that has not received serious attention from society. Magelang duck products are expected to have portions in societies' protein needs and the economy's value to make additional income. This research aimed to analyze Magelang duck farmers' behavior on marketing Magelang duck products, either the eggs or meat from cast-off ducks, to induce local farmers' creative economy. This research was held in Ngadirojo village, Secang subdistrict, Magelang district, from January to February 2020. Samples used were local farmers selected on purpose or purposive random sampling. They were 30 persons of farmers. The farmers selected were based on the total livestock owned in Ngadirojo. The method used in this research were survey, interview, and direct observation. Variables observed were farmers' behavior on marketing the livestock product, behavior on marketing the processed product of Magelang ducks, behavior on using marketing channel, and price determinations using a questioner observed by Likert scale. The data collected were analyzed using the z-test. The result showed that the level of farmers behavior on marketing the Magelang duck products either on eggs and meat from cast-off ducks were 95%, behavior on marketing the harvests of Magelang duck as a processed product were 0%, and behavior of the selling method and the price determination of Magelang duck were 81.4%. It is expected that the result of this marketing behavior identification can induce the development of the Magelang duck creative economy and provide positive effects on farmer's additional income.

Keywords: Behavior, Livestock product, Magelang duck.

Introduction

Poultry farming provides many economic benefits. One of the poultry businesses that is entirely developed in Indonesia is the duck farming business. The duck farming business has considerable potential to create employment opportunities and meet animal protein food needs. Based on Presidential Regulation (Perpres) Number 72 of 2015 concerning Amendments to Perpres No. 6 of 2009 concerning the Creative Economic Agency (Bekraf), it has classified the creative economy sub-sector into 16. Culinary is one

of the sub-sectors that can be developed. Ducks are a commodity that can be relied on in the culinary field as a source of nutrition and income for the community. The growth of the creative economy should be fostered at the village community level. With the growth of the creative economy, it is hoped that it will provide a significant economic contribution, creating a favorable business climate; build national image and identity; develop an economy based on local resources.

Magelang Regency, Central Java Province, has ducks native to Indonesia. Based on the Decree of the Minister of Agriculture No.701

/ Kpts / PD.410 / 2/2013 (Ministry of Agriculture, 2013). The superiority of Magelang ducks is their high adaptability to new environments. They are cultivated as producers of eggs and meat (dual-use). The eggs' size is large; the egg shell's color is bright blue, solid. Another advantage is that it has a large body shape with greater body weight so that the "rejected" is more marketable as cut ducks.

Businesses carried out by breeders still face various obstacles, both external and internal. Obstacles from production, processing, capital, marketing, unsupportive business climate, and limited human resource capacity. For the sake of business improvement and sustainability, the development of Magelang duck livestock must be pursued. A more intensive maintenance pattern must be implemented so that the marketable livestock yield will be greater.

Efficient product marketing and not detrimental to farmers because it is known that marketing is a crucial stage of economic activity in the livestock agribusiness sector. Business people and breeders want a complete and right product to be used by consumers (Rahardi and Hartono, 2003). The economic quality of the breeders is emphasized on the sale of eggs and meat only. Even though duck eggs are widely preferred, both for direct consumption or for making processed products such as salted eggs, which are very high in nutrition, "martabak" and other processed products.

The need for a touch of technology in increasing the production of eggs and their processed products. The production of processed meat products from rejected ducks is also considered very potential. It can reduce dependence on chicken and ruminant meat-based meat products such as goats and cows. The raw material price for rejected ducks can be lower because of the public's opinion that their meat is tough when consumed. This rejected duck meat can be used as a diversified product such as meatballs, sausages, shredded, and nuggets. It is hoped that the diversified products processed from Magelang ducks will provide more significant benefits for the breeder family.

This research was conducted to determine the behavior of breeders in marketing livestock and Magelang ducks. To provide an overview of breeders and the community about the right behavior in the context of marketing livestock products and optimizing livestock products to increase income and foster the local area's creative economy.

Material and Method

This research was conducted in Ngadirojo Village, Secang District, Magelang Regency, from January to February 2020 using 30 breeders as respondents. Thirty respondents in Ngadirojo Village were selected because the village still has many active Magelang duck breeders. The research location sample is determined intentionally or purposively, according to Arikunto (2010). Primary data in this study

were obtained from questionnaires answered by respondents. Measurement of behavior data is calculated using a Likert scale with a scaled category (low, medium, and high) and then calculated the percentage in each category that experienced behavior changes. This study's secondary data were obtained from literature studies related to research data collection techniques used in surveys, interviews and questionnaires, and field observations. The data obtained in the research will be collected and then classified, then analyzed using the z-test and analyzed by SPSS and then described.

$$Z_{hit} = \frac{\frac{x}{n} - P_o}{\sqrt{\frac{P_o(1 - P_o)}{n}}}$$

The hypothesis of this study:

Ho = it is suspected that most (50%) breeders have high behavior

Ha = it is suspected that most (50%) breeders have low behavior

significance level = 0.05% with n = 30

Z hit > Z table = Ho is rejected, Ha accepted

Z hit < Z table = Ho accepted, Ha rejected

The Z-test is used because the sample size is considered large, namely 30

respondents and the population variants. The indicator analyzed is the behavior of the breeders manifested in action (Notoadmodjo, 2010). Actions here include breeders' behavior in marketing livestock products, both rejected meat and eggs, behavior in marketing processed livestock products, farmer behavior in selling livestock products, and determining prices. These indicators are assessed through the questions that have been made. Each question has three answer choices with the highest weight of 3. From the calculation results, it is found that $Z_{hit} < Z_{table}$ then Ho is accepted, Ha is rejected, it is suspected that most (50%) breeders have high behavior.

Results and Discussion

The behavior of breeders in marketing rejected meat and eggs

Marketing patterns in livestock are one of the most crucial activities. Marketing activities aim to distribute Magelang duck livestock products in the form of eggs and meat. Marketing agencies facilitate duck production distribution from breeders to end consumers properly (Sukirno, 2005).

Table 1. Behavior livestock farmers in marketing their ducks Magelang

Indicator	behavior level(%)
Behavior in marketing the meat of culled and eggs	95
Behavior in the marketing of refined products	0
Behavior in the use of marketing channels and price	81.4

Ngadirojo Breeder duck in the village had no difficulty in a market the product. From the research results

presented in table 1, 95% of breeders market their livestock products: eggs and meat, in consumers' hands. According to the

interviews and observations in the field, they help increase the income from the sales. Businesses in agriculture or livestock cannot be relied on as the primary income because they cannot fully fulfill the living needs of breeders and their families. The results of existing livestock activities are still on a traditional scale (Aziz, 2019). The interview results found that breeders in Ngadirojo Village kept Magelang ducks as a side business. However, their side business wants the results of this livestock business to provide more economic value. The economic value of this livestock will increase along with the increasing demand for meat and eggs. An increase must follow this increase in production. However, because the maintenance patterns are still traditional and semi-intensive, livestock products such as eggs produced are not optimal following the opinion (Rahayu et al., 2019) which states that during the 30 days of observation, the bodyweight generated in the semi-intensive maintenance of Magelang ducks in the production period is lower than in the intensive maintenance pattern. The number of egg production in intensive rearing systems is higher than semi-intensive rearing systems need for a more intensive maintenance pattern, so that the livestock yields obtained increase. Farmers can market more livestock products to increase the farmer's family income.

Behavior in marketing processed livestock products

There are still 0% of breeders in Ngadirojo Village, Secang District, who market their processed Magelang duck livestock from the research results. Marta et al. (2017) reported that diversifying food into appropriate and varied processed products could increase the product selling value and income. Likewise, according to (Alamsyah et al., 2013), the purpose of diversifying duck products is to increase economic value, nutritional value, and product quality and extend the shelf life of meat and egg products.

Processed duck meat products are still very limited in the community because they have characteristics that tend to be less desirable, especially the fishy aroma and chewy texture. Likewise, duck egg products have more rancid characteristics and contain high cholesterol. Therefore, it is necessary to carry out an innovative process of processing duck meat and eggs into various attractive products and other products derived from chicken meat and eggs. (Kusmayadi, 2020) Duck meat diversification can be processed into nuggets, sausages, jerky, shredded, and meatballs, while duck eggs are processed into salted eggs of various flavors, smoked salted egg, egg "rendang" mayonnaise, egg roulade, and salted egg "bothok".

To support society's economic growth, it is necessary to establish a creative economy industry in the culinary or food sector. The

establishment of a creative economy industry at the rural communities level has excellent potential in developing the local economy. The creative economy's impact is that it can improve human resource quality by developing ideas, creativity, innovation, and the ability to access technology. The creative economy can develop the community's entrepreneurial spirit, especially since the food sector's creative economy has the most promising potential. Magelang ducks can be used as a commodity in developing the creative economy in the food or culinary sector. Knowledge, skills, and attitudes of increasing knowledge and technology must be embedded in the breeder family. Especially in terms of creative processing of processed eggs or duck meat products, then the right marketing patterns in selling the processed products so that they can sell well in the community and later can be used as icons for souvenirs typical of the people of Ngadirojo Village, Secang District.

Behavior in the use of marketing channels and prices

Erwin (2010) states that the marketing channels formed in the marketing process are very diverse, for example, (a) Producers deal directly with end consumers, (b) Producers - middlemen - traders - wholesalers - retailers - end consumers, (c) Producers - middlemen - wholesalers - retailers - end consumers and (d) Producers - collectors - wholesalers - retailers - end

consumers. Marketing can be said to be efficient if it meets two conditions, namely being able to deliver the products from farmers or breeders to consumers at low costs and being able to make a fair share of the total price paid by the final consumer to all parties involved in the production activities and the trade route. for 30 days (Sihombing, 2011)

From the results of the study, 81.4% used marketing channels in marketing their products. The marketing channels used are duck breeders who directly sell duck eggs or meat to consumers near their homes and consumers who go directly to the cage. From the observations and interviews, this marketing channel's selling value is the highest because it does not go to retailers or collectors. The marketing channel is then the breeders sell eggs or meat to retailers and collectors. (Being et al., 2020) stated that the marketing pattern of ducks in Pematang Balam Village, Hulu Palik District, North Bengkulu Regency is carried out by farmers directly to retailers and collectors, and each farmer determines the price. This is following the results of researchers. According to Budiharjo (2009), duck breeders usually sell their livestock production to collector traders who regularly visit breeders, so breeders do not need to be bothered or confused about marketing their products to consumers. This kind of marketing pattern is profitable for breeders because they can fully concentrate on managing production activities.

Conclusion

The behavior patterns of breeders in marketing Magelang ducks in Ngadirojo Village, Kecamatan Secang, Magelang Regency are high in farmers' behavior in marketing rejected meat and eggs; behavior in the use of marketing channels and prices and is classified as low in the behavior of marketing processed livestock products. The development of farmers' creative economy in Ngadirojo Village needs to be grown by selling livestock products in eggs and meat and processing them into various processed products or diversification to increase their economic value.

The breeders' motivation must be built because they are believed to encourage the desire to increase welfare by improving their business behavior. The livestock office or local government must provide support, counseling, and assistance so that livestock productivity, skills, and income of Magelang duck breeders in the Ngadirojo area increase.

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References

- Alamsyah, A., Basuki, E., Prarudiyanto, A., Cicilia, S. 2019. Diversification of Processed Chicken Meat Products. *Abdi Mas TPB's Journal*. 1 (1): 63 - 69.
- Azis, R. and D. Kurniawan. 2019. Strategy to Increase the Capability of Duck Farmers through Training on Feed Management for Super Hybrid Duck Farmer Groups in Slorok Village, Doko District, Blitar Regency. *Journal of Archipelago Service and Empowerment (JPPNu)*. 1 (1): 25-31.
- Bieng, B., E. Soetrisno, T. Sucahyo and BD Setiawan. 2020. Population and Maintenance Management and Marketing Patterns of Ducks (Case Study in Pematang Balam Village, Hulu Palik District, North Bengkulu Regency). *Indonesian Journal of Animal Science*. 15 (1): 98-109.
- Budiharjo, K. 2009. Profitability Analysis of Duck Farming Business Development in Pagerbarang District, Tegal Regency. *Mediagro*. 5 (2): 12-19.
- Ministry of Agriculture. 2013. Decree of the Minister of Agriculture Number 701 / Kpts / PD.410 / 2/2013 concerning the Determination of Magelang Duck Clumps. Ministry of Agriculture. Jakarta.
- Kusmayadi, A and Sundari Hospital. 2020. Development of Creative Industries Based on Products of Diversification of Cihateup Duck Meat and Eggs in Tasikmalaya. *Journal of Research and Community Service (Manhaj)*. 9 (1): 18 - 22.
- Marta, H., Cahyana, Y., Arifin, HR 2017. Diversification Program of Processed Products Made from Raw

- Sukun as Efforts to Improve Business in Rancakalong District, Sumedang Regency. *Journal of Science and Technology Applications for Society*. 6 (3): 227 - 232.
- Notoadmodjo S. 2010. *Behavioral Science*. Jakarta: Rineke Cipta.
- Rahardi, F. M and R. Hartono. 2003. *Animal Husbandry Agribusiness. Self-help spreader*, Jakarta.
- Rahayu, TP, L. Walidi, and MSI Pradipta. 2019. Quality of Magelang Duck Rations on Intensive and Semi Intensive Maintenance of Body Weight and Egg Production. *Bulletin of Applied Animal Research (BAAR)*. 1 (1): 8-14. Salendu. AHS 2012. Integration of Ducks and Rice in Supporting Food Security in North Sulawesi. *Proceedings of the National Seminar on Sustainable Animal Husbandry 4*. Jatinangor, 7 November 2012. p. 78-83.
- Sihombing, L. 2011. *Agricultural Product Management*. USU Press. Field.
- Sukirno, S. 2005. *Introductory Micro Economic Theory* third edition. Rajagrafindo Persada. Jakarta.