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ANALYSIS OF THE FINANCIAL FEASIBILITY OF THE LAYER DUCK (Anas sp) BREEDING BUSINESS IN SEUNEBOK BARU VILLAGE, MANYAK PAYED DISTRICT, ACEH TAMIANG

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Abstract
This research aims to analyze the cost structure and profitability of the broiler duck farming business (Anas Sp) in Batee Puteh village, Langsa Lama sub-district, Langsa city. The method used is a survey method and direct interviews with breeders. The population in this study were breeders who cultivated broiler ducks with an ownership scale of more than 100 individuals, totaling 2 people. The method used in sampling is the Census Method, namely by taking the entire population to be used as a sample. The data collected includes primary data and secondary data. The research results show that the cost structure incurred by breeders consists of: fixed costs amounting to IDR 4,473,535,-/year with a percentage of 2.98% and variable costs as big as IDR 79,369,000/year with a percentage of 52.91%. The total income received by duck breeders in Batee Puteh Village is IDR151,200,000,-/year with total production costs of IDR83,842,535,-/year resulting in huge profits of IDR67,357,465,-/Year and IDR5,613,122,-/Month with the average profit being IDR33,678,733,-/Year and IDR2,806,561,-/Month. Based on the results of the sensitivity analysis under normal conditions and after changes in production, a 5% decrease in production, a 10% increase in feed prices and a 15% decrease in cage usage costs indicate that the duck farming business in Batee Puteh Village is still feasible to run.

Keywords: *Feasibility, Sensitivity, Cost Structure, Duck Farming Business.*

INTRODUCTION

Poultry farming in Indonesia is relatively more developed compared to other livestock businesses. This can be seen from its significant contribution in expanding employment opportunities, increasing people's income, and meeting the need for food with high nutritional value. Duck farming is one of the poultry farming businesses that is quite developed in Indonesia. Although not as popular as chicken farming, duck farming has quite significant potential in egg and meat production. Compared to other types of poultry, ducks have advantages, including resistance to disease, easy adaptation to local conditions, and easy maintenance. Therefore, duck farming is not too risky so it has great potential to be developed (Rambu, 2022).

Duck farming is increasingly popular as an alternative form of profitable poultry farming business. More and more people are choosing duck farming as a means of investment and source of income, either as a side business or a main business. So that it makes livestock farming one of the businesses that is closest to the Indonesian people (Rahma et al., 2021). Aceh is one of the centers for the development of duck farming businesses. The duck population in 2021 reached 2,180,309, and in 2022 the population increased to 2,223,913 (BPS Aceh Province, 2022)

Langsa City is one of the areas located in Aceh Province. In Langsa City, there are 4 sub-districts that are currently developing duck farming (Basriwijaya et al., 2021), one of which is Langsa Lama Sub-district as the second largest area producing duck population after East Langsa, which has a livestock population of 10,391 with 280 breeders. Village with the largest number of ducks in Langsa. Lama is Bate Puteh Village with a duck population of 2,068 and the village with the lowest number of ducks is Sidodadi Village with a duck population of 91 (Langsa Lama District Agricultural Extension Center, 2023).

One of the poultry that produces meat and has good prospects for the development of livestock businesses is meat ducks. The development of this business contributes to the livestock sector. Duck meat farming has strategic potential that can meet the need for meat in the market and can increase the income of farmers (Srianingrum et al., 2023). Batee Puteh Village, Langsa

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Lama District, Langsa City, has natural conditions that support the development of activities in the livestock sector, so that the community makes duck farming a side business, especially meat duck farming. However, the duck farming business in Batee Puteh Village is currently still facing several problems, including a business pattern that tends to be traditional and the costs incurred for feed are often not comparable to the production produced so that farmers suffer losses (Hanisah et al., 2023). So it is necessary to study further how much income is obtained from the duck farming business carried out by the community, how much input capacity is required to produce output. According to Nuswardhani (2018), if the increase in output prices received by farmers is not comparable to the increase in production input prices that farmers must pay, accompanied by slower increases in productivity, this will result in low income for farmers.

Cost and income analysis is very necessary as a material in making decisions regarding the use of technology and in choosing the best priorities for the future with the aim of increasing livestock production and improving living standards. In doing business, a good and correct cost structure is needed to find out what types of expenses have been incurred by the company so that the business will continue to rotate and financial performance becomes efficient. Data and information on profits, sales and total capital can be used to determine capital development on sales and capital development on profits (Wulandari et al., 2019). The purpose of this study was to analyze the cost structure and profitability of the meat duck livestock business (Anas Sp) in Batee Puteh Village, Langsa Lama District, Langsa City.

RESEARCH METHODS

Research Location and Time

This research was conducted from February to March 2024 in Bate Puteh Village, Langsa Lama District, Langsa City. The research location was determined purposively, based on the consideration that the area is one of the centers for the development of duck farming businesses, although it still faces several challenges, such as traditional farming practices and feed costs that are often disproportionate to the production results.

Data Source Type

The research employed a survey method combined with direct interviews with duck farmers. The population in this study consisted of duck meat farmers with ownership scales of more than 100 ducks, totaling two individuals. The sampling method used was the census method, meaning that the entire population was taken as the sample. The data collected consisted of primary data obtained through interviews and observations, and secondary data gathered from supporting documents and literature relevant to the research.

Data Analysis

Production Cost

Production costs are all costs incurred in the production process by adding up the results of the total fixed costs and variable costs. (Finka, 2020). Mathematically it can be written as follows:

TC = TFC + TVC

TC = Cost Total (Rp/ production period)
TFC = Total Cost Fixed (Rp/period production)
TVC = Total Cost Variables (Rp/ production period)

Calculation Cost Still Average (AFC) uses formula :

AFC = TFC/Q

AFC = Average Fixed Cost (Rp/Unit)

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TFC = Fixed Cost (Rp/production period)
Q = Amount Production (Kg/period production)

Cost Calculation Variables Average (AVC) use formula :
AVC = TVC/Q
AVC = Cost Variables Average (Rp/period production)
TVC = Cost Variables (Rp/ production period)
Q = Production Quantity (Kg/period production)

Calculation Cost Total Average (AC) use formula :
AC = TC/Q Or AC = AFC + AVC

AC = Average Total Cost (Rp/Unit)
AFC = Average Fixed Cost (Rp/Unit)
AVC = Cost Variables Average (Rp/Unit)

Reception

Revenue is the multiplication of the number of units sold by the price per unit of the product. According to Ekowati et al (2014) describes the revenue formula as follows:
TR = P × Q
TR = Reception (Rp/ production period)
P = Price Production (Rp/kg)
Q = Amount Production (kg/period production)

Profit

Profit is the difference between the revenue and with total cost, which has been issued by breeder. According to The Wise (Atmaja, 2018) profit formula as follows:
π = TR – TC

π = Profit (Rp/production period)
TR = Reception (Rp/period production)
TC = Total cost (Rp/ production period)

Net Present Value (NPV)

Net Present Value (NPV) is difference between mark Now from current cash which comes in with the present value of the cash flows that come out in the time period. certain (Ariadi et al ., 2021). Mathematically it can be formulated as follows:

$$NPV = \frac{Bt - Ct}{(1+i)^t}$$

Bt = Benefit year to year
Ct = Cost year to year
I = Discount Rate
T = Year

1. If NPV > 0 then business worth doing
2. If NPV < 0 then business not worth doing
3. If NPV = 0 then business is at in condition BEP

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Net B/C ratio

Net B/C ratio is the comparison of the amount of positive net present value with the amount of negative net present value (Putri, 2021). Mathematically, it can be formulated as follows:

$$Net\ B/C = \frac{PV +}{PV -}$$

1. Net B/C > 1, meaning effort worthy to be run
2. Net B/C = 1, meaning of effort Which run is at breakeven point
3. Net B/C < 1, meaning the effort that run No worthy

RESULTS AND DISCUSSION

Structure Cost

Structure cost is types cost Which issued For business in this matter is business farm start from preparation pen, equipment, purchase seeds, feed, medicines, labor until the harvest process and form a single cost unit. To analyze the cost structure, the types of costs incurred must first be known. The following are the types of costs incurred in the duck production process in Batee Puteh Village:

1. Investment Cost

Cost investment is the cost that issued in try cattle from the beginning until the business gains benefits several years later. Details of the investment costs of meat duck farmers in Bate Puteh Village can be seen in the following table.

Table 1. Cost Investment Business Duck Farming

No.	Name	Amount Cost Investment (Rp)
1.	Amar Ansari	61,381,000
2.	Lita Marlene	4,773,000
	Total	**66,154,000**
	Average	**33,077,000**

Based on the table above, you can see the total investment costs incurred by farmers. on business cattle duck that is as big as Rp. 66,154,000.- with average amounting to Rp33,077,000. This cost consists of investment costs for cages and equipment. The costs incurred are the initial capital for a duck farming business. This is in line with research conducted by Intan Fitriani (2020), where investment costs are the initial costs incurred when running a business.

2. Production Cost

The production costs of duck farming are all costs that must be incurred by farmers during the process of their farming business to increase production results. The production costs of duck farming in Bate Puteh Village include; seed costs, feed and medicine costs, depreciation costs of cages and equipment, labor costs, and transportation costs. The production costs incurred by meat duck farmers in Batee Puteh Village can be grouped into two, namely:

a. Cost Still (FC)

Fixed costs are costs that do not change even if the level of output changes in meaning the cost that No finished used in very process production. Cost fixed costs issued by meat duck farmers in Batee Puteh Village can be seen in Table 2. The table above shows the fixed costs incurred by farmers in duck farming. These costs include depreciation costs for cages and depreciation of equipment. The cages used are made of iron and wood where the roof of the cage is made of zinc and has a floor of soil while the equipment used by farmers includes drinking places, feeding places, buckets, lamps, brooms and hose.

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Table 2. Cost Still Business Cattle Duck

No.	Name	Amount Cost Still (Rp/Year)
1.	Amar Ansari	3,709,830
2.	Lita Marlene	763,705
Total		**4,473,535**
Average		**2,236,768**

Total cost still Which issued by breeder as big as Rp4,473,535,- /Year with an average of Rp2,236,768,- /Year. If calculated in Rp/Month, the total fixed cost is Rp372,795,- with an average of Rp186,397,-.

b. Cost Variables (VC)

Cost variable is the cost that will changed if level output changed in the sense of costs that are used up in one production process. The variable costs incurred by farmers can be seen in the following table.

Table 3. Cost Variables Business Cattle Duck

No.	Name	Amount Cost Variables (Rp/Year)
1.	Amar Ansari	55,488,000
2.	Lita Marlene	23,881,000
Total		**79,369,000**
Average		**39,684,500**

Table in on show cost variable Which issued by breeder on business cattle duck. Cost the consists of from cost means production that covering costs for seeds/DOD, costs for medicines and vitamins, as well as costs for pellet feed, bran, sago and waste feed, electricity costs, transportation costs in the form of pedicabs used by farmers to deliver livestock to consumers, labor costs, sanitation labor costs pen, giving feed, drugs And harvesting. Total variable costs that issued by breeder duck as big as Rp79,369,000.-/Year And Rp. 6,614,083,- /Month with an average Rp39,684,500,-/Year And Rp3,307,042,- /Month.

After known types the cost that issued by breeder so The cost structure can be seen (Table 4). The following table is the cost structure that issued in the duck production process in Batee Puteh Village. Based on the table 4, it can be seen that the types of costs incurred by farmers consist of; 1). Investment costs of Rp66,154,000, - with a percentage of 44.10% which is the initial capital spent by farmers to start their business. These costs include investment costs for cages of Rp64,000,000, - with a percentage of 42.67% and equipment investment of Rp2,154,000,- with a percentage of 1.44%. 2). Fixed costs per year of Rp4,473,535,- with a percentage of 2.98% which includes depreciation costs of cages of Rp4,320,000,-/Year with a percentage of 2.88% and depreciation costs of equipment of Rp153,535,-/Year with a percentage of 0.10%. 3). Variable costs or non-fixed costs per year of Rp79,369,000,- with a percentage of 52.91%. These costs are used to purchase production facilities in the form of seeds (DOD), vitamins, medicines and feed. In addition, it is used to pay for electricity, transportation and labor. Of all the variable costs incurred, of course the purchase of seeds/DOD and feed is the largest. Feed greatly affects the growth and development of livestock. However, feed costs are also something that greatly affects the income of livestock businesses. The more efficient the feeding of livestock, the greater the income obtained (Rini Mastuti et al ., 2018). In the livestock business at the research site, the cost of feed incurred was IDR 25,321,000, - / year with a percentage of 16.88%, so that the total cost was IDR 149,996,535, - with an average of IDR 74,998,268, -

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Table 4. Structure Cost Business Cattle Duck

No.	Component Cost	Amount(Rp)	Percentage (%)
Cost investment			
1.	Pen	64,000,000	42.67
2.	Equipment	2,154,000	1.44
Total cost investment		**66,154,000**	**44.10**
Cost fixed/Year			
1.	Shrinkage of the cage	4,320,000	2.88
2.	Depreciation equipment	153,535	0.10
Total cost still		**4,473,535**	**2.98**
Cost variable/Year			
1.	Means of production		
	Seeds/dod (Day Old Duck)	37,200,000	24.80
	Drugs	568,000	0.38
	Vitamin	848,000	0.57
	Feed	25,321,000	16.88
2.	Lighting		
	Electricity	3,000,000	2.00
3.	Transportation		
	Pedicab	2,880,000	1.92
4.	Power Work		
	Sanitation pen	864,000	0.58
	Purchase feed And drugs	8,160,000	5.44
	Harvesting	528,000	0.35
	Total cost variable		**79,369,000**
	Cost Total		**149,996,535**
	Cost Average		**74,998,268**

Production And Reception

Production is an activity to produce goods or services. In this case, production Which produced is cattle duck. Cattle duck Which produced by breeders in Village Bates White own risk level failure harvest as big as 10% due to several factors such as livestock that die, are disabled or are attacked by disease. If there are livestock that are disabled, usually farmers cannot sell them so that the ducks are consumed by the farmers themselves.

Income is the result of sales received by farmers. Income from a livestock business can be calculated by multiplying the number of ducks produced by the selling price. The average income from duck farming businesses obtained by duck farmers in Batee Puteh Village can be seen in Table 5. It can be seen that the total income of livestock farmers is IDR 151,200,000/year and IDR 12,600,000/month with an average income of IDR 151,200,000/year. that is as big as Rp. 75,600,000,-/year And Rp. 6,300,000,-/month. The income is obtained by selling a number of ducks at a predetermined price .

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Table 5. Reception Business Cattle Duck (Rp/Year)

No.	Name	Cattle Duck sold (Tail/Year)	price /head (Rp)	Reception (Rp/Year)
1.	Amar Ansari	2.160	40,000	86,400,000
2.	Lita Marlene	1,440	45,000	64,800,000
Total				**151,200,000**
Average				**75,600,000**

Profit Which accepted by breeder duck is results calculation from the difference between revenue and total costs or production costs where revenue is determined by the sales value of duck production, while total costs are determined by production costs, both fixed costs and variable costs incurred during production ongoing. Calculation profit business can seen on table following:

Table 6. Duck Farming Business Profits (Rp/Year)

No.	Name	Reception (Rp/Year)	Cost Production (Rp/Year)	Profit (Rp/Year)
1.	Amar Ansari	86,400,000	59,197,830	27.202.170
2.	Lita Marlene	64,800,000	24,644,705	40,155,295
	Total	**151,200,000**	**83,842,535**	**67,357,465**
Average		**75,600,000**	**41,921,268**	**33,678,733**

Based on the results of the analysis of the profits of the duck farming business, it shows that the business cattle duck in Village Batee White profitable. It is known total reception from farmers in one year, which is IDR 151,200,000,- while the total costs incurred during the production process are IDR 83,842,535,-/year so that the total profit Which obtained as big as Rp67,357,465,-/Year And Rp5,613,122,- /Month with average profit breeder that is as big as Rp33,678,733,-/Year and Rp2,806,561,-/Month. The difference in the amount of profit obtained by farmers is influenced by by difference amount cost Which issued And difference the acceptance that obtained. Profit can improved with allocate production factors optimally. This is in line with research conducted by Bayu Anggara et al (2022) which states that, to achieve maximum profit in livestock farming is by allocating production factors optimally. The better the business is implemented, the higher the profit obtained.

Analysis of Business Sensitivity

Analysis sensitivity is used to see the impact of a condition the changing one namely a change in in calculation cost or benefit to the results of a feasibility analysis. In this study, sensitivity analysis was used by finding the NPV and B/C Ratio values to assess what would happen to the results of the feasibility analysis of the duck farming business in Batee Puteh Village if there was a change in production decline of 5%, an increase in feed prices of 10% and a decrease in costs. use pen as big as 15%. For more to explain can see on the following table.

NPV analysis is useful for knowing how much the net value of an investment is at this time (using a discount factor of 10.5% according to the state-owned bank credit interest rate) while Net B/C shows how many times the benefits are obtained from the costs incurred. Based on Table 7 on can seen value NPV And Net B/C The ratio of duck farming efforts in Batee

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Puteh Village under normal conditions and three measured conditions its sensitivity Because decline production, increase price feed And reduction in the cost of using cages.

Table 7. Mark NPV And Net B/C Ratio Business Cattle Duck

No.	Details		Results		
	Condition Beginning		Production declined 5%	Ascension feed price 10%	Decrease cage usage fee 15%
1.	NPV	99,890,467	81.254.134	93,648,528	111,087,867
2.	Net B/C	2.51	2.23	2.42	2.96

In the initial or normal conditions, the NPV result obtained was Rp. 99,890,467. Mark This show that NPV Which obtained more big from 0. So according to the NPV criteria , this business is worth continuing and developing. As for mark Net B/C Ratio Which obtained that is as big as 2.51. This means that every expenditure for production costs of Rp1,- can produce a profit of Rp2.51,-. Judging from the Net B/C criteria, this business is feasible to run. And developed with indicator mark Net B/C more big from One (Net B/C > 1).

On condition after the occurrence decline production as big as 5% obtained NPV result as big as Rp81,254,134,-. Mark This show that NPV Which obtained bigger from 0. So that in accordance with criteria NPV business This worthy For forwarded and developed. As for mark Net B/C Ratio Which obtained that is as big as 2.23. This means that every expenditure for production costs of Rp1,- can produce a profit of Rp2.23,-. Judging from the Net B/C criteria, this business is feasible to run. And developed with indicator mark Net B/C more big from One (Net B/C > 1).

In conditions after a 10% increase in feed prices, the results obtained were NPV as big as Rp93,648,528,-. Mark This show that NPV Which obtained is greater than 0. So according to the NPV criteria this business is feasible to be continued and developed. The Net B/C Ratio value obtained is 2.42. This means that every expenditure for production costs of Rp1,- can generate a profit of Rp2.42,-. Judging from the Net B/C criteria , this business is feasible to run and develop with a Net B/C value indicator greater than one (Net B/C > 1).

In the condition after the decrease in cage costs by 15%, the NPV result was Rp111,087,867. This value shows that the NPV obtained more big from 0. So that in accordance with criteria NPV business This worthy of forwarded And developed. As for mark Net B/C Ratio Which obtained which is 2.96. This means that every expenditure for production costs of Rp1,- can generate a profit of Rp2.96,-. Judging from the Net B/C criteria, this business is feasible to run and develop with a Net B/C value indicator greater than one (Net B/C > 1).

Analysis sensitivity done For see sensitivity with change that happened on A problem Which investigated in study This, for example on price increases feed Of course result in change the influential to cost total livestock production for each farmer. Meanwhile, the decrease in production has an impact on the income received by farmers, the more the decrease in production, the less income received by farmers. This is in line with research conducted by Pradnyawati et al., (2021), that production affects farmers' income because the higher the production, the greater the income received by farmers. Likewise, with the decrease in the cost of using cages, by offsetting the reduced production costs, it allows farmers For get profit Which more big Because decrease production cost Which issued. So that change on condition the need in analysis using sensitivity analysis to see if the business is is still feasible if there is a change in uncertainty conditions. The feasibility indicators are determined by the NPV value and Net B/C Ratio. Based on the results of the sensitivity analysis under normal conditions and after a change in production decrease of 5%, an increase in feed prices of 10% and a decrease in the cost of use pen as big as 15% show that business cattle duck in Village Batee Puteh is still feasible

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to run and generate profit because it has met the NPV and Net B/C Ratio criteria. This is in accordance with the statement Waleleng et al (2022) that is If mark NPV > 0 so business it is said feasible and if the Net B/C value is > 1 then the business is also said to be feasible to continue.

Average reception business cattle in Village Bates White can it is said it is not too big if the income from the livestock business is broken down into monthly amounts, which Of course give results to the acceptance that accepted Still not enough in fulfilling need his life in family. By Because That, breeder make livestock farming a side business to increase income.

CONCLUSION AND SUGGESTION

Conclusion

1. The cost structure incurred by farmers consists of fixed costs of Rp4,473,535,-/Year with a percentage of 2.98% and variable costs of Rp79,369,000,-/Year with a percentage of 52.91%. Income received by farmers duck in Village Batee White in a way overall as big as Rp. 151,200,000,- /year with a total production cost of Rp. 83,842,535,-/year resulting in profit as big as Rp67,357,465,-/Year And Rp. 5,613,122,-/Month with profit average is Rp33,678,733,-/Year And Rp2,806,561,-
/Month.

2. The results of the sensitivity analysis under normal conditions and after a decrease in changes occurred. production as big as 5%, increase price feed as big as 10% And a 15% decrease in the cost of using cages shows that the duck farming business in the village Batee White Still still worthy For run And produce profit.

Suggestions

1. Duck farmers are advised to record all costs incurred in detail so that they can find out how much expenditure must be incurred in the production process and report their livestock business to the village head or local government so that their livestock business has a permit related to the legality of a business and is supervised.
2. To the government or related institutions to be able to make efforts to procure feed concentrate or feed addition with price Which affordable by duck farmers and provide counseling on the benefits of this additional feed.

BIBLIOGRAPHY

Ariadi, H., Syakirin, M. B., Pranggono, H., Soeprapto, H., & Mulya, N. A. (2021). Kelayakan Finansial Usaha Budidaya Udang Vaname (*L. vannamei*) Pola Intensif di Pt. Menjangan Mas Nusantara Banten. *9*(2), 240–249.

Badan Pusat Statistik Provinsi Aceh. (2022).

Balai Penyuluhan Pertanian Kecamatan Langsa Lama. (2024).

Basriwijaya, K. M. Z., Alham, F., & Saragih, F. H. (2021). Peran Wanita Peternak Itik dalam Membantu Pendapatan Keluarga di Desa Asam Peutik Kecamatan Langsa Lama Kota Langsa. *Mediagro*, *17*(1), 47–56.

Finka, M. (2020). Analisis Pendapatan Usaha Ternak Sapi Potong di Desa Lempang Kecamatan Tanete Riaja Kabupaten Barru. 1–111.

Hanisah., Mulyani, C., Fairus., & Basriwijaya, K. M. Z. (2023). Pemberdayaan Peternak Itik Melalui Keterampilan Pakan Fermentasi Keong Sawah Sebagai Alternatif Pakan Itik di Desa Batee Puteh. 6, 152–161.

Mastuti, R., Supristiwendi, S., Andika. (2018). Pengaruh Skala Usaha, Biaya Pakan dan Penggunaan Tenaga Kerja Terhadap Pendapatan Peternak Ayam Broiler Pedaging (*Gallus Sp*) di Kecamatan Idi Rayeuk Kabupaten Aceh Timur. *Jurnal Penelitian Agrisamudra*, *5*(1), 75–83.

Received :09-09-2024 Accepted:16-12-2024 Publish : 29-12-2024

Nuswardhani, S. K. (2018). Struktur Biaya dan Profitabilitas Usahatani Tanaman Pangan (Padi, Jagung, dan Kedelai). 8(1), 64–74.

Pradnyawati, I. G. A. B., & Cipta, W. (2021). Pengaruh Luas Lahan, Modal dan Jumlah Produksi Terhadap Pendapatan Petani Sayur di Kecamatan Baturiti. *Ekuitas: Jurnal Pendidikan Ekonomi*, *9*(1), 93.

Putri Nursaidah Purba. (2021). Analisis Pendapatan dan Kelayakan Usaha Ternak Sapi (Studi Kasus: Desa Baja Ronggi, Kecamatan Dolok Masihul, Kabupaten Serdang Bedagai).

Rahma, W. I, Rahayu, A., Ratnawati,S., & Anindyawati, N. (2021). Perilaku Peternak dalam Pemeliharaan Itik Magelang Guna Menghasilkan Ternak Yang Aman, Sehat dan Produktif di Desa Ngadirojo Kecamatan Secang, Kabupaten Magelang. 5, 1086–1094.

Rambu, I. (2022). Kontribusi Usaha Ternak Itik Petelur Terhadap Pendapatan Keluarga di Desa Pekkendekan Kecamatan Denpina Kabupaten Toraja Utara.

Srianingrum., Likah, S., & Priyanto, B. (2023). Analisis Strategi Pengembangan Usaha Ternak Itik Pedaging di Kecamatan Kalidawir Kabupaten Tulungagung. *AGRIEKSTENSIA Jurnal Penelitian Terapan Bidang Pertanian*, *22*(2), 173– 180.

Wulandari, S. P., Nugroho, B. A., & Utami, H. D. (2019). Analisis Profitabilitas Usaha Peternakan Itik Petelur di Kecamatan Banyubiru Kabupaten Semarang. 1–13.