Advances in Social Science, Education and Humanities Research, volume 226

1st International Conference on Social Sciences (ICSS 2018)

Price Analysis of Broiler Carcass in Traditional Market of Jember Regency

1st Merry Muspita Dyah Utami
Dept. of Animal Science
Politeknik Negeri Jember
Jember, Indonesia
merry.mdu@polije.ac.id

2nd Feri Dianda
Dept.of Animal Science
Politeknik Negeri Jember
Jember, Indonesia

3rd Nanang Dwi Wahyono
Dept. of Agricultural Production
Politeknik Negeri Jember
Jember, Indonesia
nanang_d_wahyono@polije.ac.id

4th Hari Rujito
Dept.of Agribusiness Management
Politeknik Negeri Jember
Jember, Indonesia
harirujito2@gmail.com

***Abstract*—The aim of the research was to the analysis of price broiler carcass to the purchasing power of consumers in the traditional market of Jember. This research was based on descriptive quantitative. The selected research areas are some Traditional Markets in Jember Regency such as Tanjung Market, Mangli Market, Patrang Market, Gebang Market, Rambipuji Market, Kepatihan Market, Sukorejo Market, Kencong Market, Sukowono Market, and Kalisat Market. The sampling method was purposive sampling and determination of the total of samples using the formula of Slovin. The data was processed using multiple linear regression analysis and t values. The research showed the price and quality of broiler carcass have a partial effect on the purchasing power of consumers with the t-count value of each variable equal to price (3.135) and broiler carcass quality (3.162). Price variables and broiler carcass quality have an effective contribution of 14.5% to the purchasing power of consumers. Price variables have an effect of 7.2% and boiler carcass quality of 7.3%. The results of this research showed that all of the variables effected on the purchasing power of consumers in traditional markets of Jember Regency.**

Keywords—price analysis, broiler carcass, traditional market, Jember

I. INTRODUCTION

Increased consumption of broiler meat is caused by several factors, one of which is the price. The price of broiler meat is more affordable compared to the price of other livestock meat and continues to increase. According to a report of demand for an item is determined by many factors such as the price of the item, the average family income, the price of substitute goods, consumer tastes, income distribution and the number of family members.

Prices can affect the level of consumer purchasing power, if commodity prices fall, the amount of demand for a commodity will increase. Consumers tend to buy large quantities. The decline in the price of a commodity allows consumers who were previously unable to buy the commodity to start buying it and encourage consumers who have already bought to buy back in large quantities. Conversely, if the price of a commodity rises, the number of requests decreases, consumers tend to look for other commodities whose prices are cheaper to use as a substitute for commodities experiencing price increases. The increase in prices causes buyers to reduce their purchases [2].

Carcasses are livestock that has been slaughtered which is reduced by blood, fur, legs, head, and innards. According to [3] carcass quality is the quality produced after cutting or slaughtering. The quality and percentage of carcass weight are influenced by the strain, gender, age, weight, and quality of food that is formed. According to [4] chicken carcass is an important commodity in terms of nutrition, socio-cultural and economic aspects. Carcass and meat quality is influenced by factors before cutting.

Quality is one of the factors that encourage consumers to buy. Carcass quality is based on quality standards, while quality standards are determined based on quality attributes, namely characteristics that affect quality. Good carcass quality is no damage to the skin or meat, while the poor carcass has less dense meat on the chest so that it looks long and thin. Consumers consider broiler carcass quality before making a buying decision. The better the carcass quality, the more buyers can increase the purchasing power of consumers.

The factors that determine the carcass value include the weight of the carcass, the amount of meat produced, and the quality of meat from the carcass concerned. Broiler carcass composition is influenced by many factors, including gender, age, and level of cage density. Relatively young chicken age will produce a lower percentage of carcass compared to the age of chickens that older. In addition to body weight factors, carcass weight also affects genetic or strain, age, ration quality, management and health of livestock [5] reported factors that determine carcass value include carcass weight, amount of meat produced and quality of meat, the quality of meat produced by carcass, age and amount of intramuscular fat in the muscle.

Physical characteristics of chicken carcasses have an important role in increasing the taste and purchasing power of consumers. The carcasses of chicken also sell in pieces of the chest, wings, back, thighs and legs or head [6]. Each piece of the carcass has a specific weight range in the species or type of age and weight [7]. Physical characteristics include the macroscopic nature of the carcass. The physical properties of carcass include six factors, including conformation, trade, fatty, wholeness, color change, and carcass cleanliness.

Carcass quality is based on the appearance, laying of meat, fat, remnants of hair, defects and carcass weight. Carcass quality is based on existing standards, while quality standards are based on quality attributes which are the characteristics of the carcass in order to avoid counterfeiting.

There are many characteristics of consumers to make the decision making of buying goods. The characteristics of consumers are influenced by several factors, namely cultural, social, individual, psychological. Every person has different characteristics that make consumers buy broiler meat to vary from buying broiler meat on the basis of its low price to good carcass quality [8].

Price is one of the most sensitive non-product variable elements for consumers because it has an important role in the eyes of consumers as a consideration in purchasing a product. Changes along the demand curve apply if the price of the requested item becomes higher or decreases. The amount of public demand for an item is determined by many factors including the price of the item, the price of other goods, household income, and the distribution community, income in the community, the taste of the community, the number of population and predictions that will be in the future.

Determining price is how to link our products with the aspirations of market goals, which means also must learn the needs, desires, and expectations of consumers. Pricing methods include: standard mark up pricing, namely a seller sets a selling price by adding a certain percentage of the cost of all items into the product class pocket, cost plus fixed fee pricing. According to this method the seller gets a fee for all costs issued regardless of the outcome and the seller will receive free as a profit from the total product cost which amount is mutually agreed upon, experience curve pricing According to this method that the unit cost of goods and services will decrease between 10% and 30% for each two-fold increase in experience companies in producing and selling these goods or services and rate of return pricing [9].

Purchasing power is a person's ability to consume a product. The purchasing power between one person and another person must be different, it can be distinguished by several factors, as seen from the person's status, work, income and so on. Purchasing power also has a close relationship with an item or product. If the item or product has a low price, the purchasing power of the person will also increase. The ability to buy someone depends on two main elements: the income spent and the price of the desired item, if the number of income spent changes, the number of goods requested will also change. Likewise, if the price of the desired item changes, the number of goods purchased will also change [10].

A traditional market is a meeting place between sellers and buyers by the presence of direct buyer-seller transactions, the building consists of outlets, open-air stalls and bases opened by the seller or a market manager. In traditional markets, most of them sell daily necessities such as food ingredients: fish, fruit, vegetables, meat, eggs, cloth, electronic goods, services, and others. Besides that, it also sells traditional cakes and other archipelago foods. The system found in this market in the transaction process is that merchants serve buyers who come to their booth and bargain to determine an agreement on the price with the amount previously [11].

Traditional markets are owned, built and or managed by the local government and there is a bargaining system between sellers and buyers. This bargaining is one of the cultures formed in the market, this can establish a closer social relationship between traders and buyers. Business premises are diverse and united in the same location. Most of the goods and services offered are locally sourced. Merchandise sold in this traditional market is the product produced by the area. The market is one of a variety of systems, intuition, procedures, social relations, and infrastructure, namely the business of selling goods, services, and labor for people in exchange for money. Goods and services sold using legal payment instruments such as fiat money. This activity is a part of economics. Markets vary in size, range, scale, geography, location, type and variety of human commodities, as well as the type of goods and services traded. The market as a regional company can be classified according to several things, namely the regional market. According to the type of activity can be classified into three types, a a retail market where there are demand and supply of goods in retail, wholesale market is a market where there are a large demand and supply, the main market is the collection center and storage of foodstuffs to be distributed to wholesalers and purchase centers. According to location and service capabilities, the market is classified into five types namely regional market, city market, regional market (district), environmental market and special market. According to time, and activities it is classified into four types including daytime markets, night markets, and emerging markets.

Various basic considerations of consumers are the reason for buying broiler meat [12]. On the base of this background, the researcher studied the price and quality of broiler carcasses for increasing the purchasing power of consumers.

II. RESEARCH METHODS

This study was quantitative descriptive to describe the research variables and how much the influence of research variables such as the variable price and quality of broiler carcass on consumer purchasing power using the survey method.

Determination of the area of this study using purposive sampling method. The selected research areas are some Traditional Markets in Jember Regency. There are 10 markets used, among others: Tanjung Market, Mangli Market, Patrang Market, Gebang Market, Rambipuji Market,

Kepatihan Market, Sukorejo Market, Kencong Market, Sukowono Market, and Kalisat Market. Researchers also consider the allocation of time, funds and communication owned by researchers.

The population used in this study is all consumers of broiler meat in the Jember Regency. The sampling method used was purposive sampling. The sampling criteria used are traders who sell broiler carcasses in Jember Regency traditional markets with a capacity above 200 kg /day.

The data collection procedure in this study uses primary data. Four data collection techniques used in obtaining primary data include observation, interview, questionnaire, and documentation.

The research instrument is a questionnaire that is arranged in detail and sequentially to obtain answers or information from the respondents concerned with variables that influence the purchasing power of consumers. Before distributing questionnaires the respondents tested the validity and reliability to test the feasibility of the contents of the questions that will be submitted to the respondent later.

Data analysis was conducted with a problem-oriented and research objectives to achieve the research objectives used validity test to determine the data collected so as not to deviate from the description of the variables studied. Validity test is done by having a positive correlation with the total score. Question items that have a positive correlation with the total score and high correlation indicate that the item has high validity. Reliability test used in this research is consistency or rigidity to measure an object under study. A research instrument is said to have a high-reliability value when the measurements made have consistent results in measuring what they want to measure. Multiple regression analysis is performed to determine the significant or insignificant effect of the dependent variable, namely the purchasing power of consumers (Y) by calculating the values of the independent variables consisting of broiler meat prices (X1), broiler carcass quality (X2), so that the effect on power buy consumers both simultaneous and partial.

III. Results And Discussion

Validity test results showed that the correlation coefficient for price and carcass quality variables and the purchasing power dependent variable has a calculated r value> r table (0.209) with a significant level (α) of 1% so that it can be stated that the questions items on the research instrument (questionnaire) it is valid so they are suitable for use in data collection.

Correlation coefficients for price variables and broiler carcass quality and the dependent variable consumer purchasing power have a greater value than the r-table value of 0.209 so that it can be stated that the question items in the research instrument (questionnaire) are valid so that they are suitable for use in data collection.

Reliability test to determine the consistency of the measuring instrument in its use or in other words the measuring instrument has consistent results if used multiple times at different times. The reliability measurement method in this study uses the Cronbach's Alpha formula. A questionnaire is said to be reliable if Cronbach's Alpha is greater than or above the limit of 0.60 (Santoso, 2005). Based on the results of the SPSS 16.0 output gives a value greater than or above the limit of 0.60 so it can be concluded that the scale of measurement of consumer purchasing power has good reliability.

Interpretation of multiple linear regression above can be seen the influence of the independent variables (price and carcass quality) on the dependent variable (consumer purchasing power), while the meaning of the multiple linear regression equation can be explained as follows: the regression equation constant (a) has a positive value of 1.163, meaning if the price and quality variables of the carcass are equal to zero, the consumer purchasing Power is 1.163 points. The regression coefficient of price variable (b1) is positive at 0.285, meaning that the price increase is 1%, there will be an increase in consumer purchasing power of 0.285% assuming other independent variables are constant.

The regression coefficient of carcass quality variable (b2) is positive at 0.272, meaning that the increase in carcass quality is 1%, then there will be an increase in consumer purchasing power of 0.272% assuming other independent variables are constant.

Simultaneous regression coefficients test to determine the effect of independent variables (price and carcass quality) on the dependent variable (consumer purchasing power) simultaneously. H0 is accepted if F-count ≤ F-table means that simultaneously there is no significant effect of variable X1, X2 on Y and H0 is rejected if F-count> F-table means simultaneously there is a significant effect of variables X1, X2 on Y. F-count value of 12.504 probability value (sig) = 0.000. F-count value> F-table (12.504>4.75) and the sig value is smaller than the probability value 0.01 or the value of 0.000 <0.01. The price of broiler meat and broiler carcass quality have a very significant effect on the purchasing power of consumers in the Jember Regency traditional market.

Partial Regression Coefficient (t-test) to determine the effect of independent variables on the dependent variable partially used t-test.

A. Testing Partial Regression Coefficients

Based on the steps of the t-test and the table above, then testing the hypothesis for each of the independent variable price and quality of the carcass towards the consumer's purchasing power are as follows:

Price Variable (X1)

The value of t-calculated price variable is 3.135 with a probability value of 0.002, while the t-table value is 2.351, so that t-count> t-table (3.135> 2.351), this indicates that the variable price partially has a significant influence on consumer purchasing power.

Broiler Carcass Quality Variables (X2)

The value of t-count the price variable is 3.162 with a probability value of 0.002, while the t-table value is 2.351, so that t-count> t-table (3.162> 2.351), this indicates that the quality variable broiler carcass partially has a significant effect on consumer purchasing power.

B. *Effect of Broiler Carcass Price and Quality on Purchasing Power*

The effect of price and quality of broiler carcass on purchasing power can be measured using the determination coefficient (R^2). This measurement to find out how much the consumer's purchasing power is when influenced by price (X1) and broiler carcass quality (X2).

Small R^2 value, so the ability of independent variables in explaining the variation of the dependent variable is very limited and the value that approaches one then the independent variables provide almost all the information needed to predict the variation of the dependent variable.

The price and quality of broiler carcass have an effect of 0.145 or 14.5% on the purchasing power of consumers, while 85.5% is influenced by other variables not examined. The effective contribution of each independent variable is the price of 0.072 (7.2%) and the quality of broiler carcass is 0.073 (7.3%).

The low influence of the price and quality of broiler carcass on the purchasing power of consumers due to the few variables studied. In addition to price and carcass quality, the purchasing power of consumers can be influenced by family income, education level, and others. The purchasing power of consumers is characterized by increasing or decreasing, where purchasing power increases if it is higher than the previous period while the purchasing power decreases marked by higher public purchasing ability than in the previous period [13]. Factors that influence consumer purchasing power are income level, level of education, level of needs, community habits, the the price of goods and fashion [14].

The value of broiler meat price coefficient for variable X1 is 0.285, indicating that the price of broiler meat has a positive influence on consumer purchasing power (Y), each increase in meat broiler price variable (X1) one unit then the consumer purchasing power variable (Y) will increase by 0.285 assuming that the other independent variables of the regression model are fixed.

The t-count value of broiler meat price variable is 3.135 while the t-table value (1%) is 2.351 (t-count> t-table 1%) this shows that the price variable of broiler meat partially has a very significant effect on the variable purchasing power of consumers. Based on the results of multiple linear regression analysis, the variable price of broiler meat had a very significant effect (P <0.01) on the purchasing power of consumers in the traditional market of Jember Regency.

Based on the results of multiple linear regression analysis that the price of broiler carcass shows a very real influence on the purchasing power of consumers, this is because in Jember Regency broiler meat is consumed not because of daily needs or the importance of an animal protein but because of low or not the price of broiler meat itself. The rise and fall of the prices of goods can affect a person's purchasing power because of the lower the goods or services, the higher the level of purchasing power [15].

Purchasing power has a close relationship with an item or product, if the item or product has a low price, then the purchasing power of the person for the item also increases, this applies as the law of demand. The individual demand curve for an item is a curve or a list that shows the quantities of an item for each unit of time that a consumer is able to buy the item at various unit prices [16].

According to [17] prices are usually formed by the balance between demand and supply, if the price is above the equilibrium limit (balance), the consumer will buy less than the amount that the producer wants to offer, whereas if the price is below equilibrium (balance) the number of goods requested is more than offered. Price is a clear aspect for buyers, consumers who don't really understand the technicalities of buying a product are often the only factor that they can understand, not infrequently the price is used as an indicator of the quality of a product.

Broiler meat traders in the traditional market of Jember Regency sell meat in the same market with a variety of prices between one trader and another, this is because every trader buys chickens from different places or people so that it can harm traders who sell at more prices high, the higher the price of an item, the less the amount of goods that will be requested by consumers, on the contrary the lower the price of an item the more the amount requested by the consumer.

The inverse relationship between the price and the quantity requested can be explained by the following conditions if an item price rises, the consumer will look for substitute goods and if the price of the item rises, the income is an obstacle for the consumer, then the buyer goods will decrease [18].

C. *Effect of Broiler Carcass Quality (X2) on Consumer Purchasing Power*

Broiler carcass quality coefficient value for X2 is 0.272 indicating that carcass quality has a positive effect on consumer purchasing power (Y), each increase in broiler carcass quality variable (X2) one unit then the consumer purchasing power variable (Y) will increase by 0.272 assuming that the variable another free of regression model is fixed.

The t-count value of the broiler carcass quality variable is 3.162 while the t-table value (1%) is 2.351 (t-table> 1% t-table). This showed that the broiler carcass quality variable has a very significant effect on the variable consumer purchasing power. Based on the results of multiple linear regression analysis, broiler carcass quality variables had a very significant effect (P <0.01) on consumer purchasing power in Jember Regency traditional markets.

Based on the results of multiple linear regression analysis shows that the quality of broiler carcass shows a very real influence on consumer purchasing power. The higher the quality of broiler carcass, the more the consumer's purchasing power, even though the goods themselves tend to be more expensive but the quality of the goods is better. Product quality that is in accordance with the wishes of consumers will affect a person's interest in buying the item so that it can increase the purchasing power of consumers [3].

Chicken carcass is the body weight of the chicken after being cut minus the head, feet, blood, hair, and internal organs. Factors that determine the carcass value include carcass weight, the amount of meat produced and the quality

of the carcass meat concerned. Chicken carcasses that are available in the traditional markets of Jember Regency tend to cut traditionally so the quality is very diverse so that it is detrimental to both producers and consumers. Chicken carcass or meat is one of the important commodities in terms of nutrition, socio-cultural and economic aspects, in addition to quality, producers are expected to provide quality chicken carcasses [4].

IV. CONCLUSION

The results of this study concluded that the price and quality of broiler carcass simultaneously affect the purchasing power of consumers with an F-count value of 12.504 (p = 0.000) and F-table value of 4.75. The price and quality of broiler carcass have a partial effect on the purchasing power of consumers with the t-count value of each variable equal to, price (3.135) and broiler carcass quality (3.162) and the t-table value of 2.351. Price variables and broiler carcass quality have an effective contribution of 14.5% to the purchasing power of consumers. Price variables have an effect of 7.2% and boiler carcass quality of 7.3%.

ACKNOWLEDGMENT

The authors would like to express our sincere gratitude to Politeknik Negeri Jember for grant the paper to present on International Conference on Social Science in Bali, Indonesia

REFERENCES

[1] S. Sadono, "Pengantar Teori Mikro Ekonomi," *Jakarta Bina Graf. LPFE Univ. Indones.*, 1985.

[2] J. Y. Bakos, "Reducing buyer search costs: Implications for electronic marketplaces," *Manage. Sci.*, vol. 43, no. 12, pp. 1676–1692, 1997.

[3] A. Hantoro, D. Rahardjo, and B. S. Santoso, "Study on the Quality of Broiler Carcasses Stored at Room Temperature After Steaming Treatments," *Anim. Prod.*, vol. 7, no. 1, 2005.

[4] F. G. Proudfoot, H. W. Hulan, and D. R. Ramey, "The effect of four stocking densities on broiler carcass grade, the incidence of breast blisters, and other performance traits," *Poult. Sci.*, vol. 58, no. 4, pp. 791–793, 1979.

[5] D. Haryadi, "Pengaruh pemanfaatan bakteri penghasil fitase (pantoea agglomerans) dalam ransum terhadap kualitas karkas ayam broiler," 2007.

[6] T. R. Muchtadi and F. A. Sugiyono, "Ilmu pengetahuan bahan pangan," *Bogor Alf.*, 2010.

[7] B. Anjarsari, *Pangan hewani: fisiologi pasca mortem dan teknologi*. Graha Ilmu, 2010.

[8] H. Jayakusumah, "Analisis faktor-faktor yang mempengaruhi konsumen dalam keputusan pembelian teh celup sariwangi: studi kasus pada masyarakat kota Bekasi," 2011.

[9] F. Tjiptono, *Strategi pemasaran*. Andi, 2018.

[10] L. De Boer, E. Labro, and P. Morlacchi, "A review of methods supporting supplier selection," *Eur. J. Purch. supply Manag.*, vol. 7, no. 2, pp. 75–89, 2001.

[11] P. Rahardja, *Teori Ekonomi Mikro Suatu Pengantar*. Lembaga Penerbit Fakultas Ekonomi Universitas Indonesia, 2018.

[12] N. M. W. R. Devi, "Pasar Umum Gubug di Kabupaten Grobogan dengan Pengolahan Tata ruang Luar dan Tata Ruang Dalam Melalui Pendekatan Ideologi Fungsionalisme Utilitarian." UAJY, 2013.

[13] I. Fisher, *The purchasing power of money: its' determination and relation to credit interest and crises*. Cosimo, Inc., 2006.

[14] J. A. Roberts, "Profiling levels of socially responsible consumer behavior: a cluster analytic approach and its implications for marketing," *J. Mark. Theory Pract.*, vol. 3, no. 4, pp. 97–117, 1995.

[15] A. McWilliams and D. Siegel, "Corporate social responsibility: A theory of the firm perspective," *Acad. Manag. Rev.*, vol. 26, no. 1, pp. 117–127, 2001.

[16] A. Arif, M. N. Rianto, and E. Amalia, "Teori mikroekonomi: Suatu perbandingan ekonomi Islam dan ekonomi konvensional," *Jakarta: Kencana*, 2010.

[17] M. Friedman, "Quantity theory of money," *new Palgrave Dict. Econ.*, pp. 1–31, 2017.

[18] W. D. Nordhaus, "Quality change in price indexes," *J. Econ. Perspect.*, vol. 12, no. 1, pp. 59–68, 1998.