

The Influence of Working Capital, Work Experience and Working Hours on Income of Lampara Catch Fishermen in Kelapa Lima District Kupang City

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ABSTRACT

This research was conducted in order 1) to analyze the development of working capital, work experience, working hours and income of fishermen in the Kelapa Lima, Districts of Kupang City (2) to know the influence working capital, working experience dan working hour in simultaneous with fisherman income in Kelapa Lima Districts of Kupang; (3) to know the influence working capital, working experience and working hour in partial with fisherman income in Kelapa Lima Districts of Kupang. This research used quatitative data because of implementation consist of data, analysis, and interpretation about the data, the source of data that used is primery data with the quisioner 5% in significance. There are 58 sample in this research that will changeble using Eviews 10 and analysed with inferential statistic analysis (classical, linear, hypothesis, determine coefisien analysis. And the research results obtained that: the average for working capital is 1.16 million / month, work experience is 14.5 years, working hours are 16.5 hours / day and fishermen's income is 2.5 million / month. The result of this research is the variable of working capital, working experience and working hour positive influence in simultaneous with fisherman income in Kelapa Lima Districts of Kupang with 53.32 % from the factors and 46.68 % from the other factors. The variable of working capital, working experience dan working hour positive influence in partial with fisherman income in Kelapa Lima Districts of Kupang. And the variable of working hour negative influence in partial with fisherman income in Kelapa Lima Districts of Kupang. Suggestion from the analysis that the fisherman needs increasing working capital and working experience so can decrease working hour in fishing and can increase the spirit of working to increase the Income of Fishermen in Kelapa Lima Districts of Kupang.

Keywords: Working Capital, Working Experience, Working Hour, Fishermen's Income.

1. INTRODUCTION

Being the biggest island nation in the world, Indonesia naturally depends on the fishing and marine industries for its economic growth. Additionally, this promotes development by raising output, creating jobs, boosting tax revenue, or boosting currency. In actuality, though, it demonstrates that the fishing community is among those severely impacted by poverty. Poverty is a major factor that undermines the ability of fishermen to enhance their social well-being since it is produced by a complicated web of interrelated causes.

In general, coastal communities have lower welfare rates than other land-dwelling populations, according to Mubyarto (1984). The fishing community's poverty is further compounded by the lack of cash and technology at their disposal, limited market access, and low levels of public involvement in the resource processing industry. In addition, there are additional factors including employment history and hours worked. A fisherman's quality of life is mostly based on what they catch, or catch productivity as it is generally called. The amount of money that fishermen will receive to cover their daily expenses is strongly impacted by the quantity of catches.

With a population of 78,850 in 2016 and an area of 15,02 km², Kelapa Lima district is one of the most populated in Kupang City. It is made up of five communities: Kelurahan Oesapa, West Oesape, South Oesapo, Kelopo Lima, and Lasiana. Geographically, the district of Kelapa Lima shares a direct boundary with Kupang Bay to the north.

Having a direct border with the coastal Kupang Gulf, the area has a lot of marine and fishing potential that should be developed, particularly in the catch fishing industry. This will allow production or catch levels to rise, which will have a direct impact on Kupang City's catch fishermen's income and regional GDP.

Table 1. Capture of Kupang City Fishing Production Volume 2017 – 2022

| Year | Number of Fishing Production Capture City of Kupang (tons) | Number of Fisheries Capture District of Kelapa Lima (tons) |
|------|--|--|
| 2017 | 19.145,00 | 4,786 |
| 2018 | 20.174.80 | 5,043 |
| 2019 | 20.733,05 | 5,183 |
| 2020 | 21.090,41 | 5,272 |
| 2021 | 22.817,77 | 5,744 |
| 2022 | 24.020,02 | 6,005 |

Source: Kupang City Fisheries Service (processed data), 2022

It is evident from Table 1 above that catch production at the Kupang City level has increased. 19.145,00 tons of catch fishing were produced in Kupang City in 2017. Additionally, at the 4.786-ton threshold in the Kelapa Lima District. With 24.020,02 tons of production fishing caught in Kupang City by 2022, the catch sector in Kupang Town has a lot of potential and has to be developed wisely and professionally.

It will be further examined, taking into account the backdrop that was previously mentioned, to see if the money that fisherman, and especially those that captured lamps, were able to use to purify their families' lives. The purpose of this study is to observe and examine the variables that affect the money earned by fisherman who catch lights in the coconut crust. (Salim, 1999) states that social and economic elements, such as capital size, labor force, number of boats, sailing distance, and experience, all have an impact on fishermen's revenue. In addition, the size of the inlet used, the education level of the fishermen, and their age all play a role.

2. THEORETICAL OVERVIEW

2.1. Fisherman Concept

A person whose fishing eye is engaged in fishing is referred to as a fisherman under Act No. 31 of 2004 on Fishing. A community of people who depend on seafood and reside in villages or along coasts is known as a fishermen's community (Sastrawijaya, 2002). A group of people whose lives are directly dependent on seafood—either by catching or by virtue of power—are considered fisherman.

2.2 Income Concept

According to Boediono, (2002) the income or income of a citizen is the result of his “sales” of the factors of production. And the production sector “purchases” those factors to be used as the input of the production process at the prices in force in the production market.

Daily, (2016) explains that income is the amount of income received by a member of the community for a certain period of time in return for a service or factor of production that has been donated. The level of income of a people in a region can be used as one of the indicators for determining the progress of the region. When the income of an area is relatively low, it is said that the progress and well-being of the people in that area is low.

2.3. Working Capital

Capital includes all financial assets, savings, real estate, vehicles, and other valuables. Depending on the firm and how the capital is used, such capital may bring in money for the capital owner. As per Sundjajaja (2003), working capital can be viewed as a flexible asset that symbolizes a segment of the investment that changes forms during the operation of a business. Samuelson and Nordhaus (2004) capital is one of the three main productive factors. The other two, land and labour, are often referred to as primary production factors. Which means that the offer is largely determined by non-economic factors, such as the fertility rate and the country's geography. In the case of fishing, for example, by using a fishing gear (which is a capital gear) the time of catching fish becomes more productive in relation to the fish caught per day.

2.4. Working Experience

Work experience is the knowledge or skills that a person has known and mastered as a result of an act or work that has been done for a certain period of time. According to (Budhyani,2008) work experience is not only measured by the length of a person's work in a particular field of work, but can be seen from the skills, skills, and abilities that the worker. Further (Adhar,2012) said that experience as a fisherman is very necessary for the production of fishermen. Finding the fish takes time, equipment, the location of the fish and the right fish feed. A person's knowledge and abilities gained via acts or work completed over a specific amount of time are referred to as work experience. Budhyani (2008) posits that job experience is not solely determined by an individual's tenure in a given sector, but also by their aptitudes, competencies, and abilities.

2.5. Work Hour

Indrawati, (2018) explains that part-time workers will earn less human capital. This is due to less working hours and working experience. Then with increased experience and working days will increase revenue in the future. Further Masyhuri, 1999) said that there are three patterns of fishing commonly carried out by fishermen: 1) more than one day catch pattern, 2) one day fishing pattern and 3) afternoon catching pattern.

2.6 Theoretical framework

In the framework of theoretical will be analysed factors that influence the income of fishermen catching lamps in the Kelapa Lima District of Kupang. Theoretically between free and bound variables needs to be explained, fisherman's income catches a lamp (as a dependent variable) influenced by labour capital, work experience, and fishermen's working hours catch a lamp (as independent variable) (see Figure 1). The development of the maritime and fishing sectors must require the development of professional human resources to produce productive and efficient enterprises. The policy in building the marine and navigational sectors should be able to create an integrated system so that all resources can be optimally utilized. This is demonstrated by increasing fishermen's productivity so that there is an increase in fisherman's income so that the standard of living of fishing can be improved.

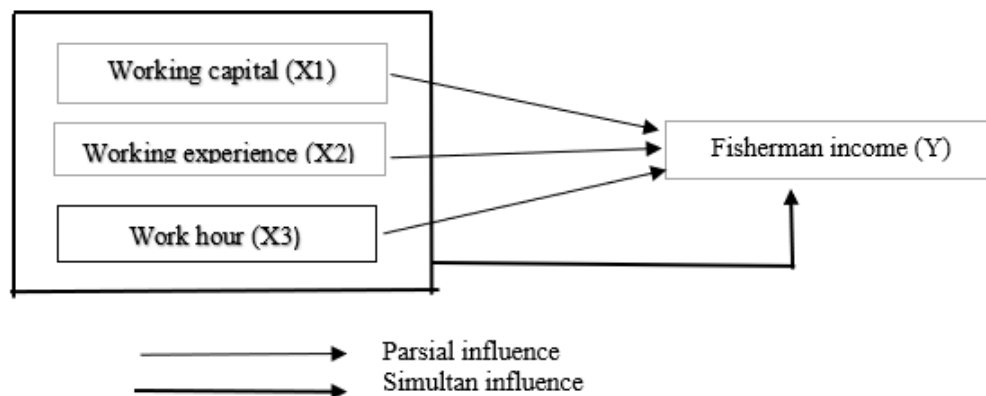


Figure 1 Framework of theoretical thinking

3. RESEARCH METHODS

This research was conducted on lamp fishermen who always catch fish in the Coconut Five Cities of Kupang. With a sample of 58 fishermen. The required data are primary data and secondary data. Data collection techniques using questionnaires or lists, observation and study of libraries or literature searches. An analysis tool that uses descriptive statistical analysis to give a general picture of research variables and use inferential statistics, i.e. double linear regression.

3.1. Population and Sample

The population in this study was 70 people who worked full time as lampara fishermen. The sample in this study were fishermen catching lampara in Kelapa Lima District, Kupang City, which was obtained using the following Slovin formula. The sampling technique used simple random sampling, so that 58 fishermen were obtained.

3.2. Data sources and Data Collection

This research uses quantitative data and qualitative data. The data source uses primary data. Data collection uses questionnaires, observation and literature study.

3.3 Data analysis technique

Descriptive analysis is analysis that attempts to describe or provide an overview or explanation of working capital, work experience, working hours and income of lampara fishing fishermen in Kelapa Lima District, Kupang City. The analytical tool used is first, using descriptive statistics, namely to provide an overview of working capital, work experience, working hours and income of fishermen catching fish with attachments. And using inferential statistics with multiple linear regression analysis to test the influence of the independent variables on the dependent variable

4. RESULTS AND DISCUSSION

4.1. Analysis Multiple Linear Regression

Table 2. Result of Analysis Multiple Linear Regression

| Dependent Variable: LOG(Y) | | | | |
|----------------------------|-------------|-----------------------|-------------|-----------|
| Method: Least Squares | | | | |
| Date: 05/04/19 Time: 10:34 | | | | |
| Sample: 1 58 | | | | |
| Included observations: 58 | | | | |
| Variable | Coefficient | Std. Error | t-Statistic | Prob. |
| C | 14.26231 | 0.419425 | 34.00440 | 0.0000 |
| X1 | 5.80E-07 | 1.03E-07 | 5.638013 | 0.0000 |
| X2 | 0.022875 | 0.004387 | 5.213780 | 0.0000 |
| X3 | -0.030450 | 0.027083 | -1.124314 | 0.2659 |
| R-squared | 0.557858 | Mean dependent var | | 14.65197 |
| Adjusted R-squared | 0.533294 | S.D. dependent var | | 0.307145 |
| S.E. of regression | 0.209829 | Akaike info criterion | | -0.218580 |
| Sum squared resid | 2.377514 | Schwarz criterion | | -0.076480 |
| Log likelihood | 10.33881 | Hannan-Quinn criter. | | -0.163229 |
| F-statistic | 22.71088 | Durbin-Watson stat | | 1.882454 |

Source: Eviews 10 Processed Results

Based on the results of data analysis (Table 2) using eviews 10 with a sample of 58 lampara fishermen with the dependent variable being income of lampara fishermen (Y) and the independent variables working capital (X1), work experience (X2), and working hours (X3), it can be concluded that the variables working capital (X1), work experience (X2), and working hours (X3) can be seen in the coefficient with the following Equation 1:

$$\beta_0 14.26231 + 5.80E - 07 * X1 + 0.022875 * X2 + (-0.030450) * X3 \dots \dots \dots (1)$$

1. The β_0 coefficient of 14.26231 means that the variables working capital (X1), work experience (X2), working hours (X3) are considered constant, so the income of fishermen catching lampara (Y) in Kelapa Lima district has increased by 14.26231. So the income of fishermen catching lampara (Y) in Kelapa Lima District has increased by 14.26231.
2. The coefficient of the working capital variable (X1) is positive, indicating that assuming the absence of other independent variables. If the working capital variable (X1) increases, then the income of lampara fishermen (Y) increases by 5.80E-07.
3. The coefficient of the work experience variable (X2) is positive, indicating that assuming the absence of other independent variables. If the work experience variable (X2) increases, then the income of lampara fishermen (Y) increases by 0.022875.
4. The coefficient of the working hours variable (X3) is negative, indicating that assuming the absence of other independent variables. If the working hours variable (X3) increases, then the income of lampara fishermen (Y) tends to decrease. If working hours increase by one, then the income of fishermen catching lampara (Y) will decrease by -0.030450.

4.2 Simultaneous Regression Coefficient Testing (F Test)

The F test basically shows how far the influence of individual explanatory/independent variables is in explaining variations in the dependent variable (Ghozali, 2009). The parameters used for the F test in this research are by comparing the table F value with the calculated F value, with a real level of 5% and dF (n-k) namely $(58-4) = 54$, we get a table F value of 2.77. Based on the calculation $22.71088 > F_{t 5\%} (2.77)$, so the conclusions taken are H_a and H_o . In other words, the hypothesis that working capital, work experience, and working hours simultaneously influence the income of lampara fishermen in Kelapa Lima District is accepted with an alpha of 5%.

4.3 Partial Regression Coefficient Testing (t Test)

The t statistical test basically shows how far the influence of individual explanatory/independent variables is in explaining variations in the dependent variable (Ghozali, 2009). The parameters used for the t test in this research are comparing the t table value with the calculated t value with a real level of 5% and dF (n-k) namely $(58-4) = 54$, we get a t table value of 1,673, after comparing these values with the calculated t value from the results of data processing with ewiews 10, it can be stated that:

1. The effect of working capital on the income of lampara fishing fishermen, with a calculated t value of 5.638013 and a probability value of 0.000, therefore the calculated t value $>$ t table is $5.638013 > 1.673$, so partially there is a significant influence of working capital on the income of lampara fishing fishermen .
2. The effect of work experience on the income of lampara fishing fishermen with a calculated t value of 5.213780 and a probability value of 0.0000, because the calculated t value $>$ t table, namely $5.213780 > 1.672$, then partially there is a significant influence of work experience on the income of lampara fishing fishermen.
3. The effect of working hours (X3) on the income of fishermen catching lampara, the calculated t value is -1.445702 and the probability value is 0.2659. Therefore, the calculated t value $<$ t table is $-1.124314 < 1.672$, so working hours partially have an insignificant effect on the income of lampara fishermen.

4.4 Coefficient of Determination (R²)

The results of the determinant coefficient test obtained an Adjusted R² value of 0.533294, meaning that 53.32% of the variable income of lampara fishing fishermen could be explained by the independent variables working capital (X1), work experience (X2), working hours (X3) while 46.68% $(100 - 53.32)$ the rest is explained from variables that were not included in this research. The adjusted R² value shows a strong relationship between the dependent and independent variables that influence it.

5. CONCLUSION

Based on the results of the analysis and discussion, the following can be drawn:

The results of the descriptive analysis show that: Working capital, work experience, working hours and income of lampara fishing fishermen in Kelapa Lima District have varied developments, namely the lowest amount of working capital (X1) is IDR 560,000 and the highest amount is IDR 1,761,000. The lowest work experience (X2) is 2 years and the highest is 25 years. The lowest number of working hours (X3) is 14 hours and the highest number of working hours is 19 hours. The lowest amount of income (Y) is IDR 1,500,000 and the highest amount of income is IDR 3,500,000.

The results of the simultaneous influence test show that the Adjusted R squared value is 0.533294 and the F-calculated value is 22.71088 with a probability of 0.000000 which is smaller than alpha 0.05, so it can be explained that simultaneously working capital, work experience and working hours has a positive and significant effect on the income of fishermen catching lampara in Kelapa Lima District, Kupang City.

The results of the partial influence test show that the t-calculated value of working capital (X1) is 5.638013; work experience (X2) of 5.213780; These figures are greater than the t-table value of 1.627. This shows that working capital and work experience have a positive and significant effect on fishermen's income. So it can be explained that the higher the working capital and work experience, the higher the income of lampara fishermen in Kelapa Lima District. For the working hours variable (X3), the partial test results show that it has a negative influence and is not significant because the calculated t value is $-1.124314 <$ from the t table 1.672. In other words, the higher the working hours, the lower the income of lampara fishermen in Kelapa Lima District.

From the conclusions above, the following suggestions can be given:

1. Lampara fishermen need to increase their working capital and work experience, in order to reduce working hours at sea, so that their income can increase.
2. The government is expected to be able to provide working capital and improve the technological capabilities of fishermen related to the lampara fishing system.
3. Future researchers can research by including other variables such as selling price of fish, distance traveled, technology, climate/weather, which have an impact on catches and income of fishermen catching using lampara.

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