Financial Analysis on Hand Line Fisheries in Dudepo Island

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Abstract

The study aims to determine the financial profile to fishing rod stretching operated by fishermen Dudepo Island include calculating capital / investment, expenses, revenues and profits later in the analysis using the R / C Ratio to determine the feasibility of efforts to be made in fishing effort demmersal and determine turnover time (payback period). Results of research addressing that average spending stalling fishing effort for Rp.22.411.367,00 per year and operating revenues on average by Rp.88.900.000,00 per year with an average gain of Rp.66.433,00 year.The business is feasible to be developed, it is in accordance with the value of R / c ratio is said to be beneficial because the total revenue is greater than the total cost and value Payback Period (PP) indicates the level of venture capital return being.

Keywords: Hand line; financial analysis; fisheries

Introduction

North Gorontalo District is a district that has a very abundant fishery resources with the longest coastline (± 217, Km) among all districts and towns of Gorontalo Province (CCDP-IFAD, North Gorontalo District, 2013).The potential of fisheries in the region of North Gorontalo District is one field that is expected to be the economic backbone of society, especially the people of the island are generally livelihood as a fisherman. Sub-sector of North Gorontalo Regency is still dominated by small-scale fisheries sector by using simple fishing gear. As in Dudepo Island, based on preliminary observation of fishing gear that is widely used on the island is fishing stalling (hand line), bagang (Lift net) and sero (Guiding barrier).Unit arrests and fishing gear used is still quite traditional.

Fishing effort a fishing activity for support / meet economic utilizing aquatic biological resources in order to get an advantage.Activities of fishing effort relate to the principles of business in general, all that is required to be considered carefully between the costs incurred by the revenues received in order to make a profit.Financial analysis should be conducted with a view to determine the development of fishing effort over time.

Financial analysis in fishing effort is necessary given the uncertainty of considerable effort.For fishermen, it is important businesses run smoothly without the need for calculations and business management.Fishing effort undertaken should generate sustainable profits in accordance with the objectives of the business (Hermansyah (2013) in Asriyanto, et al, 2014).Financial analysis in addition to determine the effectiveness of an investment, financial analysis can also estimate the operating budget to come.Based on the above, then it is so exciting for authors to be studied.So that the author intends to conduct research on financial analysis to fishing rod back and forth on the Dudepo Island, District Anggrek, North Gorontalo District.

Research Methodology

The method used is descriptive research method. The purpose of using this method is to collect information related to fishing rod back and forth. Characteristics of these methods are the information obtained from the sample, the information collected through the submission of oral and written questions (Kamarga, 2010) in Aprilia, 2011). Case revealed in this study is about the financial profile of fishing effort with fishing gear fishing rod back and forth. The study was conducted in May 2015 until January of 2016 in the Dudepo Island District Anggrek North Gorontalo Regency.

Based on preliminary observations there are 188 villagers were fishermen on the Dudepo Island. Fishing gear used is quite traditional: hand line, Lift net (bagang) and guiding barrier (sero).Fishing gear that is used as an object of research is angling fishing gear because most people of Dudepo Island fishermen using angling fishing gear, both for sidejob fishermen and full fishermen.

The sampling technique is done by using purposive sampling method, the sampling is based on

the consideration or has taken researchers believe that the information and related to the purpose of the study (Soepeno, 1997 in Sugiharto, 2007).

Samples taken as many as 15 people with the active consideration of fishermen that were sampled, which is its main job as a fisherman.

The data analysis is intended to simplify the data into a form that is easily understood.Data and information that has been obtained and analyzed using financial analysis.Measurement of financial analysis covering.

Spending fishermen calculated according Soekartawi (1995) in Asriyanto (2014).

Expenses used in the fishery business covers production costs, according to Rahardi (2001) in Mahardikha (2008) production costs are divided into two types, ie a fixed cost (fixed cost), the cost of which use is not exhausted in one production and variable costs (variable cost), the cost of which runs into one production.

An analysis of revenue is a quantity that measures the amount of fishing income earned in calculating the income of fishermen fishing effort by multiplying the selling price of the catch.

This analysis can be used to determine the amount of profits gained from a business activity that is carried out (Umar (2003) in Rahmi, 2013).

Comparative analysis of revenues with costs (Revenue-Cost Ratio), to determine the results of the business activities of fishing during certain periods (Sugiarto et al (2002) in Mattasari, 2012). Criteria:

1. If total revenue> total cost, or R / C Ratio> 1 then the business profitable or feasible to proceed;
2. If the total income of <total cost, or R / C Ratio <1 then the loss of business, it is not feasible to continue;
3. If total revenue = total cost, or R / C Ratio = 1 business no profit and no loss or break even.

Payback period (PP) is an investment appraisal of a project that is based on the repayment of the investment costs (Djamin, 1984) in Mahardikha, 2008). Criteria:

If the payback period is shorter time than the time set as a return of capital, the effort is feasible to proceed.

Result and Discussion

The method used is descriptive research method. The purpose of using this method is to collect information related to fishing rod back and forth. Characteristics of these methods is the information obtained from the sample, the information collected through the submission of oral and written questions (Kamarga (2010) in Aprilia, 2011). Case revealed in this study is about the financial profile of fishing effort with fishing gear.

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Table 1 The average investment per year

Description	Investment (Rp)
Minimum	1.850.000
Maximum	9.150.000
Average	3.260.167

Source: Primary data (2015).

Production cost

The production costs are business expenses incurred during the arrest process, the cost of production on the Dudepo Island consist of fixed costs and variable costs. Fixed costs are costs incurred in a fixed amount, which consists of depreciation expense boat, machine depreciation and depletion of fishing gear. Operational costs (variable costs) are costs that numbers fluctuate at each fishing operation, namely fuel, supplies, ice and bait. Cost variables used in fishing effort in Dudepo Island presented in Table 2.

Tabel 2 Average variable cost peryear

Description	Value /year
Minimum	12.600.000
Maximum	31.500.000
Average	19.151.200

Source: Primary data (2015).

The total costs are costs incurred by totaling the cost of investment and operating costs. The total average cost to be incurred in the fishing business by using angling fishing gear in Dudepo Island can be seen in Table 3.

Tabel 3 Average Cost peryear.

Cost	Value (Rp)
Investment	3.260.167
Operating	19.151.200
Total	22.411.367

Source: Primary data (2015).

Income

According Kisworo (2013) in Asriyanto (2014) income depends on the volume of the catch, the type and condition of the fish and fish prices in the market. The sale value of fish on the Dudepo Island not so distinguished on the size of the fish, but sold at a price per kilogram. Price per kg fish average of Rp. 35,000. Total income earned on fishing effort using stalling fishing gear can be seen in Table 4.

Table 4 Average revenue peryear.

Description	Value /year
Minimum	63.000.000
Maximum	126.000.000
Average	88.900.000

Source: Primary data (2015).

The average income of reef fishing effort (Demmersal) in Dudepo Island using stalling fishing Rp 88.9 million with the number of catches of 2540 kg per year, a minimum income of Rp 63 million per year with the number of catches to 1800 kg, and revenue up to Rp 126 million per year by the number of catches of 3600 kg. Revenues derived from the sale of fishing catch, according Asriyanto (2014) of his income of fishermen affected by the long experience of fishermen and fishing.

Profit

The advantage is the ultimate goal of a fishing effort carried out by fishermen. The advantage is affected by revenue and costs incurred, therefore fishermen are trying to get the fish in an amount as much as possible by holding expenses to a minimum to get the maximum benefit. Net gains from venture fishing with a fishing rod back and forth in Dudepo Island can be seen in Table 5.

Table 5 Average profit peryear.

Description	Value/year
Total revenue	88.900.000
Total cost	22.411.367
Profit	66.488.633

The average profit earned in fishing effort using stalling fishing gear on the Dudepo Island with the type of reef fish catches (Demersal)Rp. 66,488,633.00 per year. To determine the level of profits, revenues compared to the amount of capital invested (Rangkuti (2001) in Sari, 2011).

The advantage obtained from the average total net income earned by the average total cost of the respective amount of USD 88,900,000.00 and US $ 22,411,367.00.

Revanue-cost rasio (R/c ratio).

Revenue-Cost Ratio is the ratio between the total revenue with total costs (Soekartawi, 2001 in Arifs, 2005). Rated R / c ratio using the fishing rod fishing effort Dudepo stalling on the island can be seen in Table 6.

Table 6 Average Revanue Cost Ratio peryear

Description	Value/year
Total revenue	88.900.000
Total cost	22.411.367
R/c ratio	4
Minimum	3
Maximum	8

Rated R / c ratio of fishing effort with fishing rod back and forth on Dudepo Island average is 4, the value of R / c ratio fastest is 3, and the maximum value of R / c ratio is 8, more details can be seen in Annex 9. This value indicates that the fishing effort in the Dudepo Island appropriate to proceed because the value of R / c ratio> 1. According to Djamin (1984) in Surya (2006) is said to be profitable fishing business when the total income is greater than the total cost or value of R / c ratio> 1, is said to break even when total revenue equals total cost or value of R / c ratio = 1 and if the total income of less than the total cost or value of R / c ratio <1 then the loss of business or no profit.

Rated R / c ratio of fishing effort by using a stretching rod obtained from the average total income earned divided by the average total cost of each amount of Rp. 88,900,000.00 and US $ 22,411,367.00 according to Fatah (2002) in Arifs (2005) in the fishery TR (Total Revenew) is the total income earned from the sale of fish caught, while TC (total cost) is all over expenses incurred during fishing.

Payback period

Payback Periods (PP) may determine a period required to close back investment spending. In other words, the calculation Payback Periods (PP) is used to determine how much time will be needed to cover the capital investment, the result is a unit of time (Mattasari, 2012).

The faster return on investment costs in a business, the better the business to be continued under RJ (1991) in Asriyanto (2014) The rate of return on venture capital quickly categorized if the value Payback Period (PP) of less than 0.3 years. If the value Payback Period (PP) over 0.3 years but less than 0.5 years mean rate of return being considered. And if the value of Payback Period (PP) over 0.5 years, the rate of return is slow. Value Payback Period (PP) fishing using a fishing rod back and forth in Dudepo Island can be seen in Table 7.

Tabel 7. Average Payback Period (PP) peryear.

Description	Value /year
Investment	22.411.367
Profit	66.488.633
Payback Period (PP)	0,3
Minimum	0,1
Maximum	0,5

The Investment issued annually is an investment where the costs incurred in one year ie fixed costs and the cost of change (variable cost) an average of Rp. 22,411,367.00 and the profits obtained on average Rp. 66,488,633.00. Value Payback Period (PP) fishing effort by using a fishing rod back and forth on the Dudepo Island an average of 0.3 years. Value Payback Period (PP) these efforts show that investment can be recouped within a period of 110 days or 3 months and 20 days, it shows the return on capital was. The return on capital is said to be moderate because the value Payback Period (PP) 0.3 but less than 0.5 years (> 3 Payback period <5). Capital pengembaian fastest time was 0.1 years, while turning a payback period of 0.5 years is the longest.

Conclusion

Development of hand line fishing business on the Dudepo Island, District Anggrek, North Gorontalo District is feasible to be developed. This is consistent with the range of investment and production costs incurred are not too large and the average amount of revenue generating profits to the value of R / c ratio is said to be beneficial because the total revenue is greater than the total cost and value Payback Period (PP) business shows the level of return on capital being.

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