

ANALYSIS OF INCOME AND FINANCIAL FEASIBILITY OF CAPTURE FISHERIES BUSINESS IN CILACAP REGENCY (CASE STUDY: DEBTOR OF ULTRA MICRO FINANCING OF FISHERIES SECTOR KUD MINO SAROYO)

Eka Yuli Winari¹, Arif Andri Wibowo^{2*}, Arintoko³, Moch Fahrudin⁴

¹Jenderal Soedirman University, eka.winari@mhs.unsoed.ac.id, Indonesia

^{2*}Jenderal Soedirman University, arif.andri.wibowo@unsoed.ac.id, Indonesia

³Jenderal Soedirman University, arintoko@unsoed.ac.id, Indonesia

⁴Directorate General of Treasury of Central Java Province, eka.winari@mhs.unsoed.ac.id, Indonesia

*corresponding author

ABSTRACT

Capture fisheries business is a business with high uncertainty because it is strongly influenced by natural factors, namely weather, season, and geographical conditions of the fishing area. Ultra micro credit in the fisheries sector really helps fishermen and coastal communities to access capital but there are still many debtors who experience problems in paying their obligations. Objective: To analyze the income, efficiency and financial feasibility of business capture fisheries run by debtors of ultra-micro financing in the fisheries sector in Cilacap Regency. Data analysis technique: descriptive analysis quantitative analysis of income, efficiency with R/C Ratio, and business financial feasibility with indicators of Net Present Value, Internal Rate of Return, Benefit/Net Cost Ratio, Dynamic Payback Period, and Return on Investment. Results: (1) The average income of capture fisheries for each group ranging from IDR 28,776,100 to IDR 30,800,019 per year. (2) All capture fisheries businesses that are debtors for ultra-micro financing for the fisheries sector in Cilacap Regency are efficient businesses. (3) Capture fisheries business in Cilacap Regency is financially feasible based on the indicators of NPV, IRR, Net B/C, DPP and ROI.

Keywords: Capture Fisheries; Income; Efficiency; Business Financial Feasibility; R/C Ratio; NPV; IRR; Net B/C; Dynamic Payback Period; ROI.

1. Introduction

Indonesia is one of the countries with the largest coastal areas in the world (Sari & Rauf, 2020). The vast territory of Indonesian waters plays an important role in providing food, employment opportunities, reactions, trade to economic prosperity for some of the population (Ali, 2021). From 2016 to 2021, the contribution of the fisheries sub-sector to Indonesia's Gross Domestic Product (GDP) at current prices and constant prices shows an increase. Based on data from the (Ministry of Maritime Affairs and Fisheries, 2022) the number of fishing fishermen in Indonesia from year 2018 to 2021 also continues to increase. There are more than 2 million Indonesians who make the fisheries sector their source of livelihood.

In general, fishermen sell their catch at the fish auction place. In 2021, Central Java Province is the province with the largest volume of marine fishery production sold at TPI in Indonesia. Cilacap district is the second largest contributor to the value of marine capture fisheries production in Central Java Province (Central Java Provincial Statistic Agency, 2023). This achievement is inseparable from the existence of the Fish Auction Place (TPI) in Cilacap Regency, where TPI is a means for fishermen to market their fish catches after going to sea (Satrio & Christanto, 2016).

In Cilacap Regency there is KUD Mino Saroyo which is a Cooperative Fisheries which was founded in 1942 and has 8,441 members in 2021. KUD Mino Saroyo manages 8 TPI units, LKM Dana Yaksa, trading units and service units. One of KUD Mino Saroyo's business units is Dana Yaksa Microfinance Institution which facilitates Ultra Micro Credit financing activities for the Fisheries Sector from BLU LPMUKP.

Ultra Micro Credit in the fisheries sector is a Synergy Program of the Ministry of Finance, Ministry of Maritime Affairs and Fisheries, Ministry of Communication and Information, Ministry of Social Affairs, and Ministry of Cooperatives and Micro, Small and Medium Enterprises in Lifting the People's Economy through Financial Inclusion (BLU LPMUKP, 2017). On March 29, 2023 Dana Yaksa Microfinance Institution had 225 members of KUD Mino Saroyo who were ultra-micro credit financing debtors in the fisheries sector. However, 138 or 61.3% of debtors are in arrears in installment payments. The arrears that occur are often associated with the uncertainty of income obtained by capture fisheries business actors. According to Lindawati & Rahardian, 2016, the capture fisheries business is full of challenges and is faced with risks and uncertainties, especially in terms of the production capacity of the catch obtained (Yanuartoro et al., 2013).

It is necessary to analyze the income and financial viability of captured fisheries businesses, especially for ultra-micro financing debtors in the fisheries sector. This is done to measure the financial benefits received by fishermen through capture fisheries business, as well as to analyze the feasibility of capture fisheries business for ultra-micro financing debtors in the fisheries sector. Research on the financial feasibility of businesses run by ultra-micro financing debtors in the fisheries sector has never been conducted by universities or other research institutions. Hopefully, the results of this research can be data and information for parties who will increase the productivity of the regional economy and improve the welfare of fishermen.

2. Literature Review

2.1 Analysis of Income and Business Efficiency

2.1.1 Income

According to Boediono, (1994), income is compensation in the value of money received by labor in the form of salaries, creditors in the form of interest, capital owners in the form of profit or net income. In business, income is the amount of revenue minus the amount of production costs. Income analysis in capture fishermen is a method used to describe the amount of income of capture fishermen (Sari & Rauf, 2020). According to Rahim (2011) capture fisheries business income is the result of reducing fisheries business revenues with fishing costs incurred by business actors at the time of fishing operations. Production costs in capture fisheries are expenses that must be incurred by capture fishermen as a means of fishing needs.

2.3.2 Efficiency

Business efficiency analysis is an analysis used to calculate the efficiency of a business. This analysis uses a ratio approach between total revenue (TR) and total costs (TC) or R/C Ratio. The R/C ratio interprets, if the R/C ratio value is greater than 1 then the project is said to be economically feasible, if the R/C ratio value is equal to 1 then it is said that the business is said to break even economically, and if the R/C value is smaller than one then it is said that the project is less economically feasible (Affandi et al., 2019).

2.2 Business Financial Feasibility Analysis

According to Ibrahim (2009) business feasibility study is an activity to assess the extent of benefits that can be obtained in carrying out a business activity. In a business feasibility study, pay attention to the concept of time value of money, this concept means that a certain amount of money available today will be more meaningful than the same amount of money a few years later (Kadariah et al., 1999). The financial aspect of business feasibility analysis is quantitative in nature, it examines the amount of funds required to build and operate a business activity.

2.3 Captured Fisheries

The capture fisheries sector is one of the economic sectors that plays an important role in the economy in Indonesia. The capture fisheries sector is a mainstay for coastal communities as a source of livelihood (Asiati & Nawawi, 2017). Capture fisheries business is one of the economic activities in the form of utilizing aquatic biological resources which aims to generate income with various fishing gear used (Andela et al., 2021).

2.4 Ultra Micro Financing Fisheries Sector

Ultra Microfinance in the fisheries sector is part of the Synergy Program of the Ministry of Finance, Ministry of Maritime Affairs and Fisheries, Ministry of Communication and Information, Ministry of Social Affairs, and Ministry of Cooperatives and Micro, Small and Medium Enterprises in lifting the people's economy through financial inclusion (BLU LPMUKP, 2017). Fishermen Microfinance Institution (MFI) Financing managed by the General Service Agency for Marine and Fisheries Business Capital Management (BLU LPMUKP) under the Ministry of Maritime Affairs and Fisheries through Microfinance Institutions (MFIs) to fishermen, cultivators, salt farmers, and micro and small business actors in the marine and fisheries sector (Ministry of Maritime Affairs and Fisheries, 2018).

3. Research Methodology

3.1 Research Design

This research is quantitative descriptive research that analyses the income and financial feasibility of the business. This research was conducted in Cilacap Regency, especially in the working area of KUD Mino Saroyo with the unit of analysis of capture fisheries business run by ultra-micro financing debtors in the fisheries sector of KUD Mino Saroyo. This research was conducted in 2023. The data in this study are primary data obtained using observation techniques and direct interviews with respondents guided by questionnaires that have been prepared.

The population in this study totaled 105 debtors, with details of the population of each respondent group based on commonly used fishing gear as follows: 57 debtors from the Tegalkatilayu, Kemiren, and Lengkong groups; 26 debtors from the Pandanarang group; 10 debtors from the Sidakaya group; and 12 debtors from the PPSC group. The method of determining the sample size was carried out using the Taro Yamane or Solvin method. Taro Yamane or slovin can be formulated as follows:

$$n = \frac{N}{1+N(e)^2} \quad (1)$$

In this formula, n is the number of samples to be used, N is the total population or the total number of ultra-micro financing debtors who run capture fisheries businesses, e is the specified precision (in this study $10\% = 0.01$), 1 is a constant number.

Based on the above calculations, it is found that the sample used is 51.2. From the number of samples, the proportional allocation of each group is determined by the formula of Nasir (1988) in his book entitled "Research Methodology" as follows:

$$n = \frac{N_a}{N_{ab}} \times n_{ab} \quad (2)$$

In the formula above, n is the number of samples in each group, n_{ab} is the total sample size, N_a is the population size of the group, and N_{ab} is the total population.

Based on the above calculations, the sample in this study totaled 52 respondents consisting of 28 respondents from the Tegalkatilayu, Kemiren, and Lengkong groups, 13 respondents from Pandanarang group, 5 respondents from the Sidakaya group, and 6 respondents from the PPSC group.

3.2 Data Analysis Techniques

3.2.1 Income Analysis

According to Soekartawi (2002), the analytical tool used to determine income is income analysis, namely by calculating the difference between total revenue and total costs used. Can be calculated using the following formula:

$$\pi = TR - TC \quad (3)$$

π in the equation is the capture fisheries business income (Rp), TR is the total revenue, and TC is the total cost incurred in the capture fisheries business.

3.2.2 Efficiency Analysis

R/C ratio is an analytical tool used to see the efficiency of a business based on the comparison between costs and revenue generated, where R/C shows the amount of revenue obtained from each rupiah (cost) incurred (Lumintang, 2013). To determine the value of the R / C ratio, a comparison is made with the following formula:

$$\text{R/C Ratio} = \frac{\text{Total Reveneue (TR)}}{\text{Total Cost (TC)}} \quad (4)$$

If the R/C Ratio > 1 , the business can be said to be efficient and profitable. If the R/C Ratio $= 1$, the business will break even (no profit and no loss). If the R/C Ratio < 1 , the business is inefficient and unprofitable.

3..2.3 Business Financial Feasibility Analysis

The analysis of business financial feasibility was conducted in aggregate per group by using the calculation of the average costs and revenues of respondents. The financial feasibility of capture fisheries businesses in Cilacap Regency for ultra-micro financing debtors in the fisheries sector is categorized in each feasibility calculation which includes the calculation of Net Present Value, Internal Rate of Return, Net B/C, Dynamic Payback Period, and Return of Investment.

- Net Present Value

NPV is an analytical method used to express future net worth based on present value (Creemers, 2018). NPV can be calculated using the formula below:

$$NPV = \sum_{t=1}^n \frac{CF_t}{(1+i)^t} - C_0 \quad (5)$$

NPV is the Net Present Value of the capture fisheries business (Rp), CF_t is the cash flow per year in period t , C_0 is the initial investment value in year 0 (Rp), i is the interest rate or discount rate (%), t is the year, and n is the number of years. If $NPV > 0$, then the capture fisheries business is financially viable, and if $NPV < 0$, then the capture fisheries business is not financially viable.

- Internal Rate of Return

IRR is the discount rate that makes the NPV of a business equal to zero. IRR is also considered the net rate of return on investment (Kurniawati, 2005). According to Johannes et al. (2015) IRR can be calculated using the following formula:

$$IRR = DfP + \frac{PVP}{PVP - PVN} \times (DfN - DfP) \quad (6)$$

DfP is the discount factor that produces positive present value, DfN is the discount factor that produces negative present value, PVP is positive present value, and PVN is negative present value. If the IRR value $>$ the interest rate, then the capture fishery is financially viable. If the IRR value $<$ interest rate, then the capture fisheries business is not financially viable.

- Net B/C Ratio

Net benefit-cost ratio (Net B/C) is the ratio between the present value of net benefits in years where net benefits are positive and net benefits that are negative (Johannes et al., 2015). Net B/C is the ratio between the sum of the positive net benefit present value and the negative net benefit present value. The formula for Net B/C according to Johannes et al. (2015) is as follows:

$$B/C \text{ Ratio} = \frac{\sum_{t=1}^n \frac{B_t - C_t}{(1+i)^t} (B_t - C_t) > 0}{\sum_{t=1}^n \frac{B_t - C_t}{(1+i)^t} (B_t - C_t) < 0} \quad (7)$$

B is the benefit, C is the cost, i is the discount rate, and t is the period or year. If the Net B/C value > 1 then the capture fishery is financially viable. If the Net B/C value < 1 then the capture fishery is not financially viable.

- Dynamic Payback Period

According to Zhang et al. (2019), the dynamic payback period is the time required for a project to recover the initial investment cost, considering the time value of money. Based on Bakar (2016), Dynamic Payback Period can be calculated using the formula below:

$$DPP = n + \frac{(a-b)}{c} \times 12 \text{ bulan} \quad (8)$$

DPP is the Dynamic Payback Period, n is the last year where cash flow has not been able to cover the initial investment, a is the amount of initial investment, b is the cumulative amount of net cash flow that has been multiplied by df until year n, and c is the amount of net cash flow that has been multiplied by df year n+1. A capture fisheries business can be said to be viable based on DPP if $DPP < \text{investment life}$. If $DPP > \text{investment life}$, the business is not financially viable.

- Return of Investment

This analysis shows the ability of investment capital to generate net income for each period of analysis, expressed in percent (Gigentika et al., 2013). Based on Syafril et al. (2022), ROI can be calculated by the formula below:

$$ROI = (\sum \text{net provit} / \sum \text{investment}) \times 100\% \quad (9)$$

If the ROI value $>$ interest rate, then a fishery business is declared profitable and feasible to run. If ROI $<$ interest rate, then the business is not feasible to run.

4. Results

4.1 General Description of Respondent Group

Capture fisheries businesses run by ultra-micro financing debtors in the fisheries sector in Cilacap Regency in this study are grouped into four groups of respondents. This grouping of respondents is based on the use of fishing gear and the catch of respondents or business actors of capture fisheries debtors of ultra-micro financing in the fisheries sector of LKM Dana Yaksa KUD Mino Saroyo. The characteristics of each group of respondents are as follows:

- Tegalkatilayu, Kemiren, and Lengkong groups : Members of Tegalkatilayu, Kemiren, and Lengkong fishing groups; The fishing gears used are arad net, sirang net, and ciker net; The number of crew members is 4 people; Main catches: layur fish, dawah fish, western shrimp, rebon shrimp, and random fish (small and miscellaneous).
- Pandanarang groups : Members of the Pandanarang fishing group; Fishing gear used are fishing rod, 4.5 inch and 2.5 inch drift gill net; The number of crew members is 2 people; Main catches: layur, white pomfret, shrimp, and sea crab.
- Sidakaya groups : Members of Sidakaya group; Fishing gear used trammel net and drift gill net size 4.5 inch; Crew is 4 people; Main catches: shrimp, white pomfret, and black pomfret.
- PPSC groups : Members of the PPSC fishing group; Fishing gear used: fishing rod, trammel nets, and 4.5 inch drift gillnets; Number of crew is 4 people; Main catches: layur, shrimp, white pomfret, and black pomfret.

4.2 Results of Data Analysis

4.2.1 Business Costs and Revenue

- Investment Costs

Investment costs are costs that must be incurred to purchase the main equipment for the fishing business. Investment equipment owned by capture fisheries business owners in this study are

in the form of boats or ships, engines, and fishing gear. The average investment costs incurred by each group of respondents are shown in Table 1.

Tabel 1. Investment Cost

No	Respondent Group	Boat	Fishing Gear	Machinery	Total Investment
1	Tegalkatilayu, Kemiren, Lengkong	17.321.429	18.660.714	27.392.857	63.375.000
2	Pandanarang	18.230.769	12.461.538	28.076.923	58.769.231
3	Sidakaya	17.600.000	17.200.000	26.000.000	60.800.000
4	PPSC	18.333.333	11.958.333	25.833.333	56.125.000

- **Fixed Costs**

Fixed costs are production costs whose amount and type do not change even though the type of production produced is not the same. Fixed costs in this study include depreciation costs and equipment maintenance costs. Depreciation costs include depreciation of boats and machinery, while maintenance costs include the cost of maintaining machinery and fishing gear. Details of the average fixed costs of each respondent group are shown in Table 2.

Tabel 2. Fixed Costs

No	Respondent Group	Depreciation Costs		Maintenance Costs		Total Fixed Costs
		Boat	Machinery	Fishing Gear	Machinery	
1	Tegalkatilayu, Kemiren, Lengkong	866.071	2.739.286	3.200.000	1.215.357	8.020.714
2	Pandanarang	911.538	2.807.692	4.530.769	1.276.923	9.526.923
3	Sidakaya	880.000	2.600.000	3.720.000	1.320.000	8.520.000
4	PPSC	916.667	2.583.333	3.633.333	1.225.000	8.358.333

- **Variable Costs**

Variable costs are business costs whose can change or not fixed. In this research, variable costs include pertalite, crew consumption, crew wages, and TPI retribution. Variable costs for each group of respondents are shown in Table 3.

Tabel 3. Variabel Cost

No.	Respondent Group	Pertalite	Crew Consumption	Crew Wages	TPI Restribution	Total Variable Cost
1	Tegalkatilayu, Kemiren, Lengkong	26.983.929	23.600.000	106.172.922	7.093.488	163.850.338
2	Pandanarang	28.175.000	14.215.385	40.523.077	4.448.675	87.362.137
3	Sidakaya	25.070.000	24.360.000	69.160.000	5.653.900	124.243.900
4	PPSC	27.408.333	23.100.000	94.966.667	6.629.000	152.104.000

- **Revenue**

Revenue in capture fisheries is the total amount of sales from fishermen's catches (Syafri et al., 2022). The revenue of capture fisheries business of ultra-micro financing debtors in the fisheries sector is divided into 3 seasons, namely peak season, regular season, and lean season. Details of the average revenue of each respondent group are shown in Table 4.

Table 4. Business Revenue

No.	Respondent Group	Peak Season	Reguar Season	Famine Season	Total Revenue
1	Tegalkatilayu, Kemiren, Lengkong	114.964.286	74.640.714	13.066.071	202.671.071
2	Pandanarang	106.823.077	16.793.846	3.488.077	127.105.000
3	Sidakaya	114.380.000	42.885.000	4.275.000	161.540.000
4	PPSC	137.500.000	39.133.333	12.766.667	189.400.000

4.2.2 Income and Efficiency Analysis

The income and efficiency of capture fisheries businesses is determined by calculating total revenue minus total cost. While business efficiency is measured using the R/C ratio calculated by dividing total revenue by total cost. The average total cost, total revenue, income of each group of capture fisheries business respondents, and the efficiency are shown in Table 5.

Table 5. Income and Efficiency Analysis

No	Respondent Group	Total Revenue	Total Cost (TFC + TVC)	Income (TR-TR)	Efficiency (TR/TC)
1	Tegalkatilayu, Kemiren, Lengkong	202.671.071	171.871.052	30.800.019	1,179
2	Pandanarang	127.105.000	96.889.060	30.215.940	1,312
3	Sidakaya	161.540.000	132.763.900	28.776.100	1,217
4	PPSC	189.400.000	160.462.333	28.937.667	1,180

4.2.3 Business Financial Feasibility Analysis

Financial feasibility analysis of capture fisheries business in this study was measured using the calculation of Net Present Value (NPV), Internal Rate of Return (IRR), Net Benefit/Cost Ratio (Net B/C), Dynamic Payback Period (DPP) and Return of Investment (ROI). There are several assumptions used in the financial feasibility analysis of this business shown in table 6.

Table 6. Assumptions in business financial feasibility analysis

No	Assumptions
1.	The project life of 20 years is adjusted to the economic life of the boat as a means used in fishing business activities;
2.	Year 0 is the current year, the year of project commencement;
3.	The financial feasibility analysis of the business is projected for the next 20 years;
4.	The increase in value of each variable over the next 20 years is equal to the average annual increase in value over the past 20 years;
5.	Revenue is derived from the sale of the catch;
6.	Using a 7% discount factor in accordance with the interest rate of ultra-micro financing in the fisheries sector at LKM Dana Yaksa KUD Mino Saroyo;
7.	The Economic Life of the boat and engine is assumed to be 20 years and 10 years;
8.	revenues are projected to increase by 7.12% annually to match the average food inflation over the last 20 years;
9.	In years 1 to 20, the cost of maintaining machinery and fishing gear is projected to increase by 4.68% annually to match the average transport inflation rate over the last 20 years.
10.	In years 1 to 20, the variable cost of pertalite is projected to increase by 6.54% each year, adjusting the average fuel inflation over the last 20 years.

No	Assumptions
11.	From years 1 to 20, ABK consumption is projected to increase by 5.23% annually, adjusting for the average inflation of processed food, beverages, cigarettes, and tobacco over the past 20 years.
12.	In years 1 to 20, crew wages and cooperative levies are projected to increase at the same rate as revenue each year. This is because the crew's wages and levies KUD is the result of the division of business revenues.

The analysis of the financial feasibility of capture fisheries business in each group of respondents based on the indicators of NPV, IRR, Net B/C, DPP, and ROI is shown in the table below.

Tabel 7. Financial Feasibility Analysis of Tegalkatilayu, Kemiren, and Lengkong Group

No	Indicator Analysis	Results	Justification	Description
1	Net Present Value (NPV)	631.169.028	NPV > 1	Feasible
2	Internal Rate of Return (IRR)	58,261%	IRR > 7%	Feasible
3	Net Benefit/Cost Ratio (Net B/C)	10,96	Net B/C > 1	Feasible
4	Dynamic Payback Period (DPP)	2,05 years	PBP < 20 years	Feasible
5	Return of Investment (ROI)	41%	ROI/year > 7%	Feasible

Tabel 8. Financial Feasibility Analysis of Pandanarang Group

No	Indicator Analysis	Results	Justification	Description
1	Net Present Value (NPV)	604.263.398	NPV > 1	Feasible
2	Internal Rate of Return (IRR)	60,780%	IRR > 7%	Feasible
3	Net Benefit/Cost Ratio (Net B/C)	11,28	Net B/C > 1	Feasible
4	Dynamic Payback Period (DPP)	2,05 years	PBP < 20 years	Feasible
5	Return of Investment (ROI)	37,84%	ROI/year > 7%	Feasible

Tabel 9. Financial Feasibility Analysis of Sidakaya Group

No	Indicator Analysis	Results	Justification	Description
1	Net Present Value (NPV)	598.416.127	NPV > 1	Feasible
2	Internal Rate of Return (IRR)	57,186%	IRR > 7%	Feasible
3	Net Benefit/Cost Ratio (Net B/C)	10,842	Net B/C > 1	Feasible
4	Dynamic Payback Period (DPP)	2,214 years	PBP < 20 years	Feasible
5	Return of Investment (ROI)	41%	ROI/year > 7%	Feasible

Tabel 10. Financial Feasibility Analysis of PPSC Group

No	Indicator Analysis	Results	Justification	Description
1	Net Present Value (NPV)	604.414.097	NPV > 1	Feasible
2	Internal Rate of Return (IRR)	61,430%	IRR > 7%	Feasible
3	Net Benefit/Cost Ratio (Net B/C)	11,769	Net B/C > 1	Feasible
4	Dynamic Payback Period (DPP)	2,04 years	PBP < 20 years	Feasible
5	Return of Investment (ROI)	43,73%	ROI/year > 7%	Feasible

The tables show that all groups of respondents have viable businesses on average. This viability is based on all indicators with justification as described in the research methods.

5. Discussion

The revenue of the ultra-microfinance debtors in the fisheries sector in Cilacap Regency is divided into three seasons, namely the peak season, the regular season, and the lean season. In each of

these seasons, the income received by the entrepreneurs tends to be different. During the peak season, fishermen can earn between IDR 1,600,000 and IDR 2,400,000 per trip, with 48 to 65 trips. During the regular season, fishermen earn between Rp 300,000 and Rp 450,000 per trip. The longest season for capture fisheries in Cilacap regency is the packelik season, which lasts about 6 months. During this lean season, fishing yields and intensity decrease. The income of the Pandanarang and PPSC groups during this season ranged from Rp 35,000 to Rp 50,000 per trip. This income does not include the costs incurred, so fishermen tend to make losses during this lean season. This is consistent with research by Sekar et al. (2022) which explains that in the lean season fishermen experience losses.

The phenomenon of bad credit in fishermen generally occurs during the lean season, where most credit payment arrears begin during the lean season. As of 9 June 2023, during the lean season the number of debtors with payment arrears increased by 140.53%. Before the lean season, the number of debtors who were in arrears was 57 debtors. Meanwhile, after the famine season, the number of debtors in arrears increased to 137 debtors. This is related to the lack of fishermen's income during the lean season, and the tendency for businesses to experience losses. Losses occur because the fish catch obtained by capture fisheries business actors is often unable to meet the costs of carrying out fishing activities. This is in line with the research of Prihatin (2017) regarding the livelihood of fishermen in the lean season.

Capture fisheries businesses run by ultra-micro financing debtors in the fisheries sector are efficient businesses. The level of business efficiency is evidenced by the R/C ratio of more than one for all respondents. Respondents in the Pandanarang group were more efficient than other groups with an R/C ratio ranging from 1.264 to 1.359 with an average of 1.312. The R/C ratio was higher than the other groups, in line with the lower crew wages compared to the other groups. Nevertheless, all respondent groups had efficient businesses, this is in line with the research of and Wattimury (2019) which states that capture fisheries business is an efficient business.

Ultra-micro financing debtors' capture fisheries businesses in each respondent group over a 20-year business life can be financially viable. Based on the NPV Indicator, this business is feasible to run because the NPV generated in each respondent is more than IDR 1. Based on the IRR indicator, this business is feasible because in 20 years of business each group can generate an IRR of more than 7%. This business is also feasible based on the Net B/C indicator because the Net B/C or the results obtained when compared to investment costs is more than 1. The rate of return on business capital based on the DPP indicator is less than 20 years, so this business can be said to be financially feasible. Based on the ROI indicator, the return obtained from this business in a period of 1 year is more than the discount factor of 7%, so that the capture fisheries business can be categorised as financially feasible. This is in line with research conducted by Fisu et al. (2020) which states that capture fisheries business is a financially viable business.

6. Conclusion

Based on the research results, the average income of ultra-micro financing debtors in the fisheries sector in Cilacap Regency in each group ranged from Rp28,776,100 to Rp30,800,019. All ultra-micro financing debtors' capture fisheries businesses in Cilacap Regency are efficient businesses. All respondent groups of ultra-micro financing debtors in the fisheries sector in Cilacap Regency based on indicators of Net Present Value, Internal Rate of Return, Net Benefit/Cost Ratio,

Dynamic Payback Period and Return of Investment can be said to be financially feasible. The implication of this research is that financial management socialization is needed so that fishermen can manage their finances properly so that their obligations and needs can be met even during the lean season, capital assistance is needed in the form of tools such as GPS and Fish finder to facilitate fishermen in conducting fishing business, and policies are needed that focus on maintaining the availability of fish in the sea in a sustainable manner.

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